

Appendix B

CONTRACT
BY AND BETWEEN
THE CITY OF SOMERVILLE ACTING THROUGH
THE PURCHASING DEPARTMENT
AND

Contract No.:

P.O. No.:

P.O. Amount: \$

Bid No.: RFQ#15-47

Not to Exceed: \$_____

Contract Period: _____
(With two one-year options to renew)

Contract For: House Doctor Agreement for Architectural & Engineering Services

Vendor:

ACCORDING TO THE SPECIFICATIONS CONTAINED HEREIN.

_____ House Doctor Contract

Year One _____

**HOUSE DOCTOR AGREEMENT FOR
ARCHITECTURAL & ENGINEERING ("A/E") SERVICES
BETWEEN
THE CITY OF SOMERVILLE
AND**

This Agreement made on the 1st day of August, 2011 is between the City of Somerville ("the **City**"), City Hall, 93 Highland Avenue, Somerville, MA 02143 and Maguire Group, Inc. ("the **A/E Professional**") located at 33 Commercial Street, Ste. 1, Foxborough, MA 02035, for the services described in the Request for Qualifications and Fee ("RFQF") attached as APPENDIX H and also described in Scope of Services for particular Projects for which the **A/E Professional** may be retained from time to time attached as APPENDIX A. The A/E Professional's principal design discipline is *architecture*.

The **City** and the **A/E Professional** agree to the following:

ARTICLE 1

DEFINITIONS

1.1. In General.

1.1.1. Well-known meanings. When words or phrases, which have a well-known technical or construction industry or trade meaning, are used herein, such words or phrases shall be interpreted in accordance with that meaning, unless otherwise stated.

1.1.2. Capitalization. The words and terms defined in this Article are capitalized in this Agreement. Other capitalized words may refer to a specific document found in the Contract Documents or may be defined in the General Terms and Conditions of the Contract.

1.1.3. Persons. Whenever the word person or persons is used, it includes, unless otherwise stated, entity or entities, respectively, including, but not limited to, corporations, partnerships, and joint venturers.

1.1.4. Singular and Plural. The following terms have the meanings indicated which are applicable to both the singular and the plural thereof.

1.2. Definitions.

1.2.1. Agreement - The Agreement is this written document between the **City** and the **A/E Professional** which is titled: Agreement for A/E Services between the City of Somerville and the **A/E Professional**, which is the executed portion of the Contract, and which forms a part of the Contract. The Agreement also includes all documents required to be attached thereto, including, but not limited to, certificates of insurance and all modifications of the Agreement.

1.2.2. Change Order - A Change Order is a document which is signed by the Contractor and the **City** which is directed to the Contractor and which authorizes the Contractor to make an addition to, a deletion from, or a revision in the Work, or an adjustment in the sum or in the time of the Contract issued on or after the date of the Contract.

1.2.3. Construction Cost - The Construction Cost is the total cost or estimated cost to the **City** of all elements of the Project designed or specified by the **A/E Professional**. The Construction Cost shall include the cost of labor at current prevailing wage rates established by the Commonwealth and furnished by the **City** (or, if applicable, current Davis Bacon wage rates established by the federal government and furnished by the **City**), materials and equipment designed, specified, selected, or specially provided for by the **A/E Professional**, plus a reasonable allowance for overhead and profit. In addition, a reasonable allowance for contingencies shall be included for market conditions at the time of bidding and for changes in the Work during construction. Construction Cost does not include the compensation of the **A/E Professional** and the **A/E Professional's** consultants, the costs of the land, rights-of-way, financing, or other costs which are the responsibility of the **City** as provided herein.

1.2.4. Construction Documents - The Construction Documents consist of Plans and Specifications setting forth in detail the requirements for the construction of the Project.

1.2.5. Contract Documents - The Contract Documents consist of the Agreement between the City and the Contractor; the notice of award of the Contract; the Notice to Proceed; the entire Project Manual; Change Orders; Work Change Directives; the Contractor's Bid and all accompanying documents; and the **A/E Professional's** written interpretations and clarifications issued on or after the issuance of the Notice to Proceed.

1.2.6. Contract - The Contract consists of all the Contract Documents.

1.2.7. Contractor - The Contractor is the person who is awarded the construction contract for the Project pursuant to M.G.L. c. 149, §§44A-H, inclusive, or M.G.L. c. 30, §39M, and is identified in the Agreement as such. The term "Contractor" is intended to include the Contractor as well as its authorized representative(s).

1.2.8. General Terms And Conditions Of The Contract - General Terms and Conditions of the Contract refers to the General Terms and Conditions of the Contract between the City and the Contractor.

1.2.9. Product Data - Product Data are illustrations, standard schedules, performance charts, instructions, brochures, diagrams, and other information furnished by the Contractor to illustrate materials or equipment for some portion of the Work.

1.2.10. Project – Where a Project involves construction, the Project is the total construction of which the Work to be provided under the Contract Documents may be the whole or a part of the Project as indicated elsewhere in the Contract Documents and may include construction by the **City** or by separate contractors; the Project is the Work described in the invitation to bid and Specifications, and illustrated by the Plans. As used herein, the word "Project" may also sometimes refer to feasibility studies, or master plans, or other services of an A/E Professional which do not relate to a construction project. Furthermore, this contract contemplates that the A/E Professional will render services for one or more Projects that are unrelated to each other. The A/E Professional's services for a given Project will be described in APPENDIX A. Each Project will be numbered separately within APPENDIX A: for example, the A/E Professional's services for Project #1 will be described in APPENDIX A-1; Project #2 will be described in APPENDIX A-2; and so forth.

1.2.11. Proposed Change Order - A Proposed Change Order is a Change Order that has not been approved by the **City**.

1.2.12. Reimbursable Expenses - Reimbursable Expenses are in addition to compensation for Basic and Additional Services and include expenses incurred by the **A/E Professional** in the interest of the Project, as identified by the following: long distance calls and faxes; fees paid for securing approval of authorities having jurisdiction over the Project; reasonable expense of reproduction necessary for the rendition of services hereunder, which expense shall not include the expense of producing the sets of documents referred to in the Schematic Design Phase, the Design Development Phase, and the Construction Document Phase herein, as these expenses are covered in the **A/E Professional's** compensation for Basic Services; expense of postage and such other expenses incurred in connection with the Project when specifically authorized in advance in writing by the **City**. Payment for photocopying letter or legal size documents shall not exceed 10¢ per page. Payment for all other documents shall be at cost. Sales tax is not a reimbursable expense. The **City's** tax-exempt number is E04-600-1414.

1.2.13. Samples - Samples are physical examples of materials, equipment, or workmanship that are representative of some portion of the Work and which establish the standards by which such portion of the Work will be judged.

1.2.14. Shop Drawings - Shop Drawings are all drawings, diagrams, illustrations, schedules, and other information which are specifically prepared or assembled by or for the Contractor and submitted by the Contractor to illustrate some portion of the Work.

1.2.15. Statement of Probable Construction Costs - The Statement of Probable Construction Costs is a preliminary, detailed estimate of Construction Cost based on current area, volume, or other unit costs. Such estimate shall indicate the cost of each category of work involved in constructing the Project (including, but not limited to, filed sub-trades) and shall establish the period of time for each category from the commencement to the completion of the construction of the Project. The detailed estimate shall include quantities of all materials and unit prices of labor and material, as well as a cost estimate containing individual line items for each item of work.

1.2.16. CPPD – Capital Projects and Planning Department

1.2.16. Substantial Completion - Substantial Completion means that the Work has been completed and opened to public use, except for minor incomplete or unsatisfactory items that do not materially impair the usefulness of the Work. The **A/E Professional** shall decide what constitutes “minor,” “incomplete,” “unsatisfactory,” and “materially” and the **A/E Professional's** decision shall be final

1.2.17. Work Change Directive - A Work Change Directive is a written directive to the Contractor issued on or after the date of the contract between the **City** and the Contractor and signed by the **City** and recommended by the **A/E Professional** ordering an addition to, a deletion from, or a revision in the Work.

1.2.18. Work - The Work means the construction and services required by the Construction Documents, whether completed or partially completed, and includes all other labor, materials, equipment, and services provided or to be provided by the Contractor to fulfill its obligations. The Work may constitute the whole or a part of the Project.

ARTICLE 2

THE A/E PROFESSIONAL'S RESPONSIBILITIES

2.1. STANDARD OF PERFORMANCE. The A/E Professional shall perform the services under this Agreement with the skill, care, and diligence in accordance with the professional standards ordinarily exercised by professional consultants practicing in the same field as the **A/E Professional** prevailing in the greater Boston area. All of the **A/E Professional's** services under this Agreement shall be performed as expeditiously as is consistent with such standards. The **A/E Professional** shall be responsible in accordance with those standards for the adequacy, safety, and overall integrity of the Project's design, including, but not limited to, the design architectural or landscape architectural (or both if applicable), structural, mechanical, and electrical design of the Project.

2.2. SCHEDULE OF PERFORMANCE. The approved schedule for the performance of the **A/E Professional's** services for a particular Project is set forth in APPENDIX A. Time is of the essence and time periods established by APPENDIX A for a particular Project and consistent with the standard of care shall not be exceeded by the **A/E Professional** except for delays due to causes outside the **A/E Professional's** control (which term shall not include staffing problems, insufficient financial resources, consultant's default, or negligent errors or omissions on the part of either the **A/E Professional** or any of its consultants).

2.3. TIMELINESS OF INTERPRETATIONS, CLARIFICATIONS, AND DECISIONS. With regard to all phases of this Agreement, the **A/E Professional** shall render interpretations, clarifications, and decisions in a timely manner pertaining to documents submitted by the **City** or the Contractor in order to avoid unreasonable delay in the orderly and sequential progress of the **A/E Professional's** services.

2.4. RELATIONSHIP WITH THE CITY. For the purposes of this Agreement, the **A/E Professional** shall be a representative of the **City** and shall advise and consult with the **City** until the termination of the Contractor's warranty and correction period.

ARTICLE 3

SCOPE OF THE A/E PROFESSIONAL'S BASIC SERVICES

3.1 IN GENERAL

3.1.1 The **A/E Professional's** Basic Services shall consist of those services set forth in APPENDIX A for a particular Project. Services may include, without limitation, any of the following:

3.1.1.1 Those services identifies below within the different phases;

3.1.1.2 Any other professional services which are reasonably necessary as determined by the **City** for the design and administration of construction of the Project, including, without limitation, the following:

3.1.1.2.1 For public building projects, all surveys (unless provided by the **City**), geotechnical services, testing services, and related information and reports reasonably required by the Project, geotechnical and civil engineers; landscape architect; independent cost estimator; fire protection, life safety, lighting, interior design, asbestos removal, and movable equipment consultants; and normal structural, mechanical, electrical, and any other engineering services necessary to produce a complete and accurate set of Construction Documents (the cost for any and all professional services is not subject to profit adjustments);

3.1.1.2.2 For park/playground projects, all surveys (unless provided by the **City**), lighting consultants, independent cost estimators (if specified in the RFP) and normal structural, mechanical, electrical, and any other engineering services necessary to produce a complete and accurate set of Construction Documents (the cost for any and all professional services is not subject to profit adjustments);

3.1.1.2.3 For roadway, bridge, and other public works projects other than park/playground projects, all surveys (unless provided by the **City**), geotechnical services, testing services, and related information and reports reasonably required by the Project, geotechnical and civil engineers; independent cost estimators; fire protection, life safety, and lighting consultants; and normal structural, mechanical, electrical, and any other engineering services necessary to produce a complete and accurate set of Construction Documents (the cost for any and all professional services is not subject to profit adjustments).

3.1.1.3 Attending and providing testimony at any formal or informal hearings related to the Project, including, but not limited to, bid protest hearings and Board of Aldermen meetings, if deemed necessary by the **City**. If the **A/E Professional** is called as a witness in a court of competent jurisdiction in a matter in which the **A/E Professional** is a named party, the **A/E Professional** will not be additionally compensated. If the **A/E Professional** is called by the City as a witness in a matter in a court of competent jurisdiction in which the **A/E Professional** is not a named party, the **A/E Professional**

will be compensated according to APPENDIX C attached hereto;

- 3.1.1.4** Preparing for and appearing on the **City's** behalf at all administrative or regulatory hearings, presentations, or conferences with respect to any zoning, building code, urban renewal, or other matters in connection with the Project, including, without limitation, any hearings, presentations, or conferences with any City, State, or Federal agencies or officials and any neighborhood groups. The **A/E Professional's** obligations under this paragraph shall include preparing plans and other materials reasonably required in connection with any such hearings, presentations, and conferences;
- 3.1.1.5** Assisting the **City** in connection with the **City's** responsibility for filing documents required for the approval of governmental authorities having jurisdiction over the Project. The **A/E Professional** shall prepare the Plans and Specifications required in order to obtain approval of, and in accordance with, all requirements of all governmental agencies having jurisdiction over the Project. Any Plans and Specifications furnished by the **A/E Professional** which are discovered to be defective during any Phase will be promptly corrected by the **A/E Professional** at no cost to the **City**, and the **A/E Professional** will promptly reimburse the **City** for all damages, if any, resulting from the use of such defective Plans and Specifications. The **City's** approval, acceptance, use of or payment for all or any part of the **A/E Professional's** services shall in no way alter the **A/E Professional's** obligations or the **City's** rights hereunder; and
- 3.1.1.6** All design and redesign services required within or between the Design Development Phase and the Construction Documents Phase to keep the Construction Cost of the Project within the fixed limit of Construction Cost.
- 3.1.2** As part of the Basic Services, the **A/E Professional** shall assist the General Contractor in preparing record drawings in accordance with the following:

 - 3.1.2.1** Record Keeping.

 - 3.1.2.1.1** As the Construction Phase progresses, the **A/E Professional** shall work with the Contractor to maintain four separate sets of in progress record drawings at the Site, one set each for architectural, mechanical, electrical, plumbing, and structural disciplines. All deviations from the Construction Documents and the exact locations of the Work as installed and constructed shall be neatly and accurately indicated. Work completed to date shall be colored and highlighted.
 - 3.1.2.2** Permanent Record Drawing Preparation.

 - 3.1.2.2.1** The **A/E Professional** shall assist the General Contractor in transferring the information contained on the in-progress record drawings to CAD compatible discs of the original contract drawings. All work shall be performed by experienced and knowledgeable draftspersons using the same standards and quality of drafting as used on the original drawings.
 - 3.1.2.3** Review of Record Drawings at Substantial Completion.

- 3.1.2.3.1** Upon Substantial Completion of the Work or portions thereof, the **A/E Professional** of record shall review and approve the above permanent record drawings.

3.1.3 Submissions of Deliverables

3.1.3.1 Format of Deliverables:

- 3.1.3.1.1** The **A/E Professional** shall submit all Deliverables required under this Contract, including but not limited to drawings, specifications, cost estimates, code analyses, color swatches, samples, fixture cuts, calculations and any other submissions specified by the **City** in a format acceptable to the **City**.
- 3.1.3.1.2** All Deliverables submitted from the **A/E Professional** to the **City** will conform to the instructions of the **City** with respect to the format, numbering, labeling and indexing. Architectural drawings shall be stamped and signed on each original document by a Designer registered in the Commonwealth of Massachusetts. Engineering drawings shall in every instance be stamped and signed on each original document by a Professional Engineer licensed in the Commonwealth, in a discipline appropriate to each respective trade.
- 3.1.3.1.3** Drawings and specifications to be used in the bidding and the award of the Construction Contract for the Project, including all special instruction to bidders and Supplementary Conditions, shall be prepared by the A/E Professional to the satisfaction of the City in a form ready for printing and publication.

3.1.3.2 Submissions:

- 3.1.3.2.1** The **A/E Professional** shall furnish to the **City** three (3) bound copies and one (1) unbound reproducible set of all Drawings and Specifications and any other Deliverables, whether intermediate or final submissions, required as part of the scope of Services for each Submission in the Schematic Design Phase and the Design Development Phase, within five (5) business days of the **City's** request. The one hundred percent (100%) Construction Bidding Documents Submission shall include five (5) bound copies and one (1) unbound reproducible "mylar" set of all drawings, and five (5) bound copies and one (1) unbound reproducible set of Specifications and any other Deliverables.
- 3.1.3.2.2** The **A/E Professional** shall provide the **City**, with three (3) copies of the estimate and analysis of Construction Cost for each respective design Phase.
- 3.1.3.2.3** The **A/E Professional** shall provide the **City**, with three (3) copies of the code analysis prepared for each respective design Phase
- 3.1.3.2.4** The **A/E Professional** shall provide the **City** with two (2) copies of each Deliverable arising out of or resulting from the Designer's activities during the Construction Administration Phase.

3.1.3.3 Electronic Submissions:

3.1.3.3.1 In addition to all other submittals called for in this Contract, the **A/E Professional** shall submit one (1) electronic copy of all required Deliverable called for by this Contract.

3.1.3.4 The electronic submissions shall be provided in a format approved by the **City** and all electronic submissions of Drawings shall be provided by the **A/E Professional** in the most current available CADD release number and version and shall at a minimum contain an electronic table of contents that lists the electronic file name and the corresponding drawing title. CADD files must also list the Capital Projects and Planning Department Project Name and Project Number.

3.1.3.4.1 All other documents shall be provided on Microsoft Word, Excel, Project, or PowerPoint, as applicable to the particular Submittal.

3.1.3.4.2 All submissions shall be labeled identifying; CPPD Project Name and Project Number, file name, drawing title, software & release, and layer identification.

3.1.3.4.3 The **City** reserves the right to require the **A/E Professional** to provide all electronic submissions on other electronic media as may be required at any time due to technology upgrades and/or changes to the electronic systems used by the **City**.

3.1.3.5 All Deliverables, including but not limited to the electronic submissions, shall be due at the times specified elsewhere in this Contract for each Phase.

3.1.3.6 The **A/E Professional's** compliance with the terms of this section shall be performed as part of the Basic Services under the Contract, and the **A/E Professional** shall not receive any additional compensation for providing the electronic submittals including but not limited to conversions or copies of software as required by the **City** as specified herein.

3.2 SCHEMATIC DESIGN PHASE. If Schematic Design is part of the Basic Services, the following shall apply:

3.2.1 General Requirements:

3.2.1.1 The **A/E Professional** shall prepare and present to the **City**, in graphic form, suggestions and recommendations for the Project. The **A/E Professional** shall consult with the **City** and other agencies as required by the **City** during this phase to ascertain the requirements of the City regarding the Project.

3.2.1.2 If a Program has been provided, the **A/E Professional's** preliminary studies shall meet the requirements of the Program for the Project and any supplemental or mandatory requirements that the **City** brings to the **A/E Professional's** attention.

3.2.1.3 The **A/E Professional** shall prepare and submit the required Deliverables for the Schematic Design Phase and complete the full scope of Services for this Phase within the Time for Completion as specified in paragraph 2.3 of this Contract. The **A/E Professional's** scope of Services for the Schematic Design Phase shall consist of the elements and scope as described in Contract Article 5.

- 3.2.1.4 In connection with the Schematic Design Phase, the **A/E Professional** shall render full architectural services, including without limitation, pertinent architectural, civil, landscape architectural, structural, plumbing, fire protection, mechanical and electrical engineering services, and any other authorized services.
- 3.2.1.5 Job Directory: The **A/E Professional** shall compile and distribute a project directory which includes all names, addresses, e-mail addresses, phone and fax numbers of the **City** representatives, **A/E Professional** and their Consultants. This shall be distributed two (2) weeks into the Schematic Design Phase, and shall be up-dated and redistributed as project participants change.
- 3.2.1.6 Meeting Notes: The **A/E Professional** shall compile meeting notes for every meeting with the **City**. These shall be distributed by the **A/E Professional** to all attendees no later than 5 business days after the meeting.
- 3.2.1.7 There will be a minimum of (2) submissions required in this Phase: one at Design Concept Phase and another at Schematic Phase Submission.

3.2.2 Design Concept Phase:

- 3.2.2.1 When directed by the **City** (due to scope of project) and prior to commencement of the Schematic Design there will be a Design Concept phase which will allow for the examination of a number of possible design solutions. The goal of the Design Concept phase is to select a *parti*, which can be developed in accordance with the requirements of the Schematic Design as outlined in the contract.
- 3.2.2.2 The extent of presentation required during the Design Concept Phase stage is intentionally limited to allow for a maximum of design effort (including consultations with the client team) and a minimum of pure drafting and writing time.
- 3.2.2.3 The Design Concept submittals must contain sufficient information to allow the project team to make an informed selection of a *parti*. At a minimum, the submittals must include:
 - 3.2.2.3.1 Statement of Design Approach
 - 3.2.2.3.2 Site Information
 - 3.2.2.3.3 Building Design
 - 3.2.2.3.4 Regulation and Code Analysis
 - 3.2.2.3.5 Costs/Schedule/Constructability
 - 3.2.2.3.6 These items are described below:
- 3.2.2.4 Design Approach: A brief statement suitable for use by the Public Facilities Department, the Users, and the Community describing the design issues, their priorities, and the manner in which the proposed design addresses the relevant issues.

3.2.2.5 Site Information: Portray the following in graphic or narrative form to explain analysis and conclusion of proposed siting.

3.2.2.5.1 Context

3.2.2.5.2 Traffic

3.2.2.5.3 Access (Pedestrian and Vehicular)

3.2.2.5.4 Topography

3.2.2.5.5 Effects upon and from Abutters

3.2.2.5.6 Environmental Impacts

3.2.2.5.7 Utilities (Availability and Location)

3.2.2.5.8 Unusual Site Conditions (e.g. water table, ledge, vegetation, etc.)

3.2.2.6 Building Design:

3.2.2.6.1 Architectural Floor Plans of All Levels Delineating:

3.2.2.6.1.1 Response to Functional Requirements of Program

3.2.2.6.1.2 Major and Minor Access

3.2.2.6.1.3 Major Spaces

3.2.2.6.1.4 Circulation

3.2.2.6.1.5 Area Calculations in square feet of all spaces compared to the approved program, if provided

3.2.2.6.2 Elevation Study Showing Exterior Materials, Fenestration, Etc.

3.2.2.6.3 Massing Study (Drawings, or Models, or Photographs, Etc.)

3.2.2.6.4 Structural

3.2.2.6.4.1 A written narrative of the design approach to the structural systems including discussion of the feasible options for foundations and superstructure as well as treatment of special situations such as unusual soils conditions or long spans.

3.2.2.6.5 Heating, Ventilating, and Air Conditioning, and Plumbing:

3.2.2.6.5.1 Written narrative of the basic plumbing systems to the extent that there may be an effect on the selection of the basic building design or as may be appropriate for special circumstances such as a natatorium.

3.2.2.6.5.2 Proposed Fuel Source

3.2.2.6.5.3 Basic Distribution Concepts

3.2.2.6.5.4 Location of Major Equipment Items such as Cooling Towers, Chillers, Air Handling Units, Exhaust Stacks, Etc..

3.2.2.6.5.5 Special System (e.g. Fume Exhausts)

3.2.2.6.5.6 If this is a renovation project, a Code Review Statement to identify remedial requirements of current codes upon existing conditions. Include a statement on fire protection system criteria or exemption there from.

3.2.2.7 Electrical Engineering:

3.2.2.7.1 Written narrative of the proposed electrical and communications systems resources, needs, and proposed scope, for the following categories, and others as may be appropriate for the project.

3.2.2.7.2 Energy Sources. Available Capacity, Estimated Demand

3.2.2.7.3 Distribution Concept

3.2.2.7.4 Emergency Power (Coverage, Production, Distribution)

3.2.2.7.5 Outline of Included Special Systems (e.g., Telecommunications, CCTV, Security, Etc.)

3.2.2.8 Resources Conservation:

3.2.2.8.1 Provide an outline and brief narrative of proposed systems/methods to satisfy legal requirements and thoughtful, responsible approach to conservation of the environment and resources.

3.2.2.8.2 Design Criteria (Temperatures/Humidity Levels/Illumination Levels)

3.2.2.8.3 Thermal Energy Recovery

3.2.2.8.4 Energy Management Controls

3.2.2.8.5 Nondepletable Energy Source Alternatives

3.2.2.8.6 Natural Environment Impact/Replication/Mitigation/Improvements

3.2.2.8.7 Agency Filing Requirements - Identify Governmental/Community Bodies having jurisdiction or concerns, and categories of such concern.

3.2.2.9 Regulation and Code Analysis: Identify use group, construction type, accessibility, and any special requirements and/or Codes.

3.2.2.10 Cost/Schedule/Constructability:

3.2.2.10.1 Budget Cost Estimate based on square foot cost allocations, or similar. At a minimum, the estimate should identify values for:

3.2.2.10.1.1 Site Development

3.2.2.10.1.2 Building Foundations and Superstructure

3.2.2.10.1.3 Exterior Building Enclosure

3.2.2.10.1.4 Interior Architectural Systems, Finishes

3.2.2.10.1.5 Vertical Transportation

3.2.2.10.1.6 Mechanical Systems

3.2.2.10.1.7 Electrical Systems

3.2.2.10.1.8 Major Built-In Special Equipment (e.g. Kitchen, Laboratory, etc.)

3.2.2.10.1.9 Other

3.2.2.11 Graphic or Written schedule for Design, Bidding, and Construction. A proposed work plan and schedule in graphic or written form for services under the Contract during design, bidding and construction. Include all anticipated tasks and submittals. Provide anticipated dates for submittals, deliverables, meetings and the critical path for design service activities. Allow time for the **City** to review and approve submittals and for obtaining all necessary permits.

3.2.2.12 Narrative of significant Constructability issues, including site constraints, abutter impacts, long lead items, etc.

3.2.3 Schematic Design Documents.

3.2.4 The **A/E Professional** shall prepare, for approval by the **City**, Schematic Design Documents consisting of drawings and other documents illustrating the scale and relationship of Project components. The architectural drawings and related criteria shall include the following:

3.2.5 Premises upon which design is based, including:

3.2.5.1 Design goals and criteria

3.2.5.2 Design concept/part as this relates to internal organization, program, relation to site, proposed building materials including engineering systems and essential formal/aesthetic ideas.

3.2.6 Building and Site Planning Diagrams (when requested by the **City** provide prior to submission of Schematic Studies Phase Submission). Where applicable, clearly differential between "new" and "existing":

3.2.6.1 Building Relationship diagrams showing relation of principal project spaces.

3.2.6.2 Building circulation diagrams showing the movement of users, staff, public, materials, supplies and equipment.

3.2.6.3 Site circulation diagrams showing the movement of vehicles and pedestrians.

3.2.7 Site Plan of project addressing impact of access, pedestrian and vehicular, environment, parking and other program criteria, shall include the following. Where applicable clearly differentiate between new and existing.

3.2.7.1 Roads, walks and all paved and surfaced areas.

3.2.7.2 Existing contours and proposed new contours.

3.2.7.3 Proposed new building location of and/or additions and all connections to existing building, where applicable. Indicate grade elevations at all entrances to building, proposed and existing.

3.2.7.4 Landscaping features.

3.2.7.5 Photographs of site and surrounding environment.

3.2.7.6 Site Section where requested by **City**.

3.2.7.7 Measures to accomplish handicapped accessibility.

3.2.8 Floor plans of all levels, identifying the area of all program spaces in square feet, shall include the following:

3.2.8.1 Overall dimensions of building.

3.2.8.2 Dimensions of major spaces.

3.2.8.3 Dimensions defined by applicable codes.

3.2.8.4 A space measurement analysis of all program spaces and of other floor areas in the Project showing the square footage of each, and indicating any variations from the approved Program.

3.2.9 Two cross-sections with floor heights, including basement, attic, and foundation identifying program spaces and relationship to site configurations. Provide additional partial sections through major spaces not shown by main building sections.

3.2.10 Four elevations from main orientation points of view, indicating relationship to site configuration. Where requested by **City**, provide elevations of "hidden" elevations where

there is an entrance.

- 3.2.11** A three dimensional representation, axonometric, study model, perspective or three aerial photographic views of study model to convey general massing of project.
- 3.2.12** Typical wall section including building foundation at large scale showing proposed materials for floor and wall construction.
- 3.2.13** An Exterior Color Theory Statement describing in graphic and written for proposed materials and their colors and discussing why they have been selected.
- 3.2.14** Structural Drawing shall include the following:
 - 3.2.14.1** Framing and foundation system description including its plusses and minuses, including costs.
 - 3.2.14.2** Framing diagram showing proposed sizes of major framing members.
 - 3.2.14.3** Foundation plan.
- 3.2.15** Fire Protection System Description shall be provided at Schematic Phase where requested by the **City**.
- 3.2.16** Mechanical Drawing and related criteria shall include the following:
 - 3.2.16.1** System description indicating the method of heating, cooling, and ventilating, extent, distribution and controls within the building, plusses and minuses including cost and how this system relates to Paragraph 5.2.2 above.
 - 3.2.16.2** Floor plans showing components of mechanical systems, distribution through building, fan room(s), mechanical, room, and duct chases.
- 3.2.17** Electrical Drawings and criteria shall include the following:
 - 3.2.17.1** Lighting layout at major and typical spaces only.
 - 3.2.17.2** Electrical plans showing service connection, major electrical equipment and electric room(s).
 - 3.2.17.3** Describe and illustrate any special electrical distribution equipment and relation to Paragraph 5.2.2.
 - 3.2.17.4** Describe design approach and provisions for telephones, fire detection and alarm, security systems, electronic communications, and special electrical systems.
- 3.2.18 Specification Documents**
 - 3.2.18.1** Preliminary or outline specifications are a brief listing of materials, finishes, and methods to be used for the project. They are arranged by divisions and in sequence according to CSI MasterFormat. In addition to names, brief explanations of

requirements and criteria may be included.

- 3.2.18.2** The Section numbers and titles established at the Schematic Design Phase shall be the same as for Section numbers and titles for the Design Development and Construction Documents Phases.

3.2.19 Construction Cost Estimate Requirements

- 3.2.19.1** The **A/E Professional** shall provide to the **City** an estimate and analysis of the cost of construction.
- 3.2.19.2** The estimate shall be developed in as much detail as the preliminary drawings and specifications permit and a cost for each Section of the Specification shall be included.
- 3.2.19.3** The estimate shall reflect the current construction cost. The **A/E Professional** shall in the recapitulation include all appropriate escalation/inflation factors to proposed dates of bidding.
- 3.2.19.4** Summary sheets in Excel format shall be developed which shall list each section of the work as well as the following:
- 3.2.19.4.1** The date that the estimate was prepared (Value Date).
 - 3.2.19.4.2** The anticipated bid date.
 - 3.2.19.4.3** Site Development Cost (including all utilities).
 - 3.2.19.4.4** Building Cost (including fixed equipment).
 - 3.2.19.4.5** Estimated construction cost of each Section of the work, totaled.
 - 3.2.19.4.6** Both the Gross and the Net Square Footage of the Building and of all program spaces and other floor areas in the Project.
 - 3.2.19.4.7** Indicate the ratio of Net to Gross Square Footage.
 - 3.2.19.4.8** Square Foot Cost of Building (gross).
 - 3.2.19.4.9** Unit User Cost (per student, bed, inmate, etc.).
 - 3.2.19.4.10** The number of days to complete project construction.

3.2.20 Code Analysis Requirements

- 3.2.20.1** The **A/E Professional** shall identify all building, environmental and other codes and regulations, which may apply to this project in a code analysis document.
- 3.2.20.2** The code analysis shall describe proposed methods for compliance with all regulations and codes.
- 3.2.20.3** Where seeking variances may be appropriate, the **A/E Professional** shall identify

these, describe variance procedure, all time periods and potential impact on project, schedule, and cost and time implications of variance denials.

3.2.20.4 Where required by the **City**, show alternative interpretations and strategies for compliance.

3.2.21 Life Cycle Cost Estimates. As part of the Basic Services and when requested by the **City**, the **A/E Professional** shall provide life-cycle cost estimates at an initial stage if the Project is a new building or a modification or replacement of an energy system in an existing building. (Reference: M.G.L. c. 149, §44M).

3.2.22 SUSTAINABLE DESIGN CRITERIA. Such criteria, if any, shall be set forth in APPENDIX A for a particular Project.

3.3 DESIGN DEVELOPMENT PHASE. If Design Development is part of a Project, the following shall apply:

3.3.1 General Requirements

3.3.1.1 Meeting Notes: The **A/E Professional** shall compile meeting notes for every meeting with **City**, which shall be distributed by the **A/E Professional** to all attendees no later than five (5) business days after the meeting.

3.3.1.2 The **A/E Professional** shall ensure that the entire design, including the work of all of the **A/E Professional's** Consultants, has been reviewed and coordinated based upon the most recent specifications, plans, drawings and other information, so as to eliminate any plan, dimensional or other conflicts between the **A/E Professional's** design and that of the various Consultant disciplines, as well as between each Consultant discipline and all others. Examples of such coordination requirements include, but are not limited to: consistency of building plans and elevations between architectural, mechanical, electrical, fire protection, fire alarm and any other applicable disciplines; verification that the spatial requirements of all engineered systems and equipment do not conflict with each other and that they conform to the dimensions provided architecturally (such as ductwork, plumbing, fire protection, lighting, fire alarm, and other electrical equipment required to fit at any point within the space above a suspended ceiling); or provision of appropriate chases or wall cavity space to accommodate concealed equipment or vertical or horizontal runs of engineered systems.

3.3.2 Drawing Requirements

3.3.2.1 Site and Utility Drawings:

3.3.2.1.1 Plan indicating existing and proposed contours and locations of the proposed building or addition(s). Show entry-level elevation and key exterior grades at perimeter. Indicate all retaining walls. Include benchmarks of site if survey is available.

3.3.2.1.2 All utilities existing and proposed, indicating location, elevation, composition and size, e.g. manholes, sewers, hydrants, light standards. Include work by

others such as utility companies and other public agencies and authorities.

3.3.2.1.3 Roads, laid out parking areas, walks, terraces and other site improvements. Indicate all measures to accomplish handicapped accessibility.

3.3.2.1.4 Building locations fixed and referenced from main survey baseline, if available.

3.3.2.1.5 Plant materials with a preliminary schedule.

3.3.2.1.6 Cuts of benches, light standards. Details of bollards, paving patterns, handrails.

3.3.2.2 Architectural Drawings and Other Graphic and Written Requirements:

3.3.2.2.1 Floor plans showing: (Minimum Scale 1/8" = 1'0").

3.3.2.2.1.1 Building perimeter with exterior wall thickness and overall dimensions.

3.3.2.2.1.2 Structural grid.

3.3.2.2.1.3 Plan requirements of mechanical and electrical systems.

3.3.2.2.1.4 Building core: Elevators, stairs, shafts, public toilets, etc., with dimensions.

3.3.2.2.1.5 Internal partitions, appropriate thickness and dimensions to fix basic organizations. Show fire ratings.

3.3.2.2.1.6 Door Swings.

3.3.2.2.1.7 Floor elevations.

3.3.2.2.1.8 Built-in furniture and equipment

3.3.2.2.1.9 An updated space measurement analysis of all programmed spaces and all other floor areas in the Project showing the square footage of each. Indicate any variation from the approved Program and Schematic Plans.

3.3.2.2.1.10 Furniture layout drawings.

3.3.2.2.2 Large scale plans showing key areas e.g. lobby, special spaces. Indicate surface materials. Key these plans to the preceding Paragraph. (Minimum Scale 1/4" - 1'0")

3.3.2.2.3 Roof Plans Showing:

3.3.2.2.3.1 Pitch and drainage pattern.

3.3.2.2.3.2 Roof drain, gutters and scuppers.

- [illegible]

3.3.2.2.10.1 Finish schedule.

3.3.2.2.10.2 Door schedule.

3.3.2.2.10.3 Window schedule.

3.3.2.2.10.4 Equipment schedules, e.g. hospital, food service.

3.3.2.2.11 Colored exterior elevations with proposed materials

3.3.2.2.12 An interior color theory statement discussing proposed paint and material selections and colors for typical and special spaces and why they have been selected and, how these selections relate to exterior materials and colors.

3.3.2.3 Structural Engineering and Other Graphic and Written Requirements:

3.3.2.3.1 Locations and dates of test boring holes and results of soil investigation including water levels, allowable soil bearing pressure and bottom grades of footings and slabs.

3.3.2.3.2 Framing plans: typical floor framing, roof framing, special framing, show framing at major openings and sizes of members.

3.3.2.3.3 Foundation Plan showing sizes and locations of components.

3.3.2.3.4 Column locations.

3.3.2.3.5 Preliminary details including floor and roof deck, methods of lateral bracing and how the requirements of the earthquake code will be met.

3.3.2.3.6 Details for special and/or incidental structural features, e.g. tunnels, connecting bridges, etc., unique architectural features.

3.3.2.3.7 Connection to existing buildings at foundation and at key points at existing structure.

3.3.2.4 Fire Protection Engineering:

3.3.2.4.1 Floor plans indicating wet or dry type systems, hose racks or cabinets and fire department tie-ins. Indicate whether a fire pump will be required and show proposed location within the building. Show typical sprinkler head layout.

3.3.2.5 Plumbing Engineering:

3.3.2.5.1 Floor plans indicating locations of all plumbing fixtures and special features, and approximate location and size of all piping systems and principal items of equipment. Provide typical riser diagrams.

3.3.2.5.2 Heating, Ventilating and Air Conditioning Drawings and Other Graphic and

Written Requirements:

- 3.3.2.5.3** Heat gain and loss calculations.
- 3.3.2.5.4** Show locations and approximate sizes of piping systems, air handling systems and principal items of equipment such as compressors or cooling towers.
- 3.3.2.5.5** Indicate space requirements of major equipment and their location in mechanical rooms, fan rooms, etc. Indicate shaft requirements.
- 3.3.2.5.6** All ductwork shall be shown double line, unless otherwise approved in writing by the **City**.

3.3.2.6 Electrical Drawings and Other Graphic and Written Requirements:

- 3.3.2.6.1** Calculations showing total electrical load.
- 3.3.2.6.2** All services including those for special purposes shall be located and indicated.
- 3.3.2.6.3** Lighting shall be indicated as to type, location and intensities in foot candles for each space, room or typical space. Provide fixture cuts of typical lighting fixtures. Provide fixture cuts for special lighting applications.
- 3.3.2.6.4** Switch gear and emergency generator.
- 3.3.2.6.5** Security drawings showing security system.
- 3.3.2.6.6** Communications drawing showing communication chases and any special distribution requirements. Indicate terminal locations.

3.3.2.7 Other Consultant's Drawings and Other Graphic and Written Requirements:

- 3.3.2.7.1** For special Consultants, e.g., kitchen, elevator, hospital equipment where appropriate, technology and communication, provide drawings that locate and define the scope of their work. Coordinate with other disciplines. Provide cuts of all major pieces of equipment.

3.3.3 Project Manual Requirements

- 3.3.3.1** Outline Specifications that are to accompany Design Development Drawings shall consist of a comprehensive description of the Project and the materials proposed for use in the Work. No detailed specifications of materials or workmanship procedures need be included; however, the general scope shall be indicated by sections as required for the Construction Specifications. The Design Development Outline Specification shall also include a comprehensive "Basis of Design". The "Basis of Design" shall be a narrative description of the project and shall include all applicable architectural, civil, structural, mechanical and electrical programs and/or systems. The **A/E Professional** shall identify all proposed filed sub-bid categories.

3.3.3.2 The following is a list of items that shall at a minimum be identified or specified in outline form in this Design Development Phase.

- 3.3.3.2.1** Site Work; clearing, drives, walks, parking areas, fences, excavation, backfill, planting.
- 3.3.3.2.2** Footings; on earth, rock, piles, caissons, proposed bearing pressures, boring logs, reason for adopting system proposed.
- 3.3.3.2.3** Foundation walls; type of concrete, reinforcing, type and extent of waterproofing.
- 3.3.3.2.4** Footing drains; type, disposal of drainage.
- 3.3.3.2.5** Exterior walls; superstructure, type, materials, brick type, alternate cladding, back-up materials, damp-proofing material and extent, special features.
- 3.3.3.2.6** Roofs; types, vapor barrier, insulation, flashings, all materials.
- 3.3.3.2.7** Flashings; general types, all materials, weights, where each type is be used.
- 3.3.3.2.8** Sheet metal; gutters, leaders, others uses, except flashings.
- 3.3.3.2.9** Windows; general types, materials, section weights, sub-frames, finish, glazing, screens.
- 3.3.3.2.10** Doors, exterior and interior; types and thickness.
- 3.3.3.2.11** Steps, exterior; including platforms and landings' materials.
- 3.3.3.2.12** Stairs, interior; including platforms, landings, walls, materials and finishes.
- 3.3.3.2.13** Framing; wood, concrete or metal systems in accordance with general design.
- 3.3.3.2.14** Partitions; materials, thickness, finishes.
- 3.3.3.2.15** Cabinet and casework; types and materials.
- 3.3.3.2.16** Food Service Equipment; types and materials.
- 3.3.3.2.17** Furring; lathing, plastering, materials and location.
- 3.3.3.2.18** Insulation thermal; types, thickness, methods of application and locations.
- 3.3.3.2.19** Acoustical treatment; types, thickness, methods of application and location.
- 3.3.3.2.20** Interior finishes; materials for floors, walls, bases, wainscots, trim, ceilings, ceiling heights.
- 3.3.3.2.21** Fire Protection; standpipe systems, sprinkler systems, fire pumps and

accessories.

- 3.3.3.2.22** Water supply, source, location of main to which connection will be made, type of pipe for service main, load requirements, load factors and pressures.
- 3.3.3.2.23** Sanitary sewers; sewage disposal system, pipe and other materials.
- 3.3.3.2.24** Storm sewers; storm drainage disposal system (institution or local facility), pipe and other materials.
- 3.3.3.2.25** Gas main; material, size, location. Interface with utility company.
- 3.3.3.2.26** Plumbing; systems such as wastes, vents, hot water, cold water, gas, air, oxygen, vacuum, main source of supply, materials for each, water heaters, pumps, thermal insulation fixture quality, all special features.
- 3.3.3.2.27** Heating, ventilating and air conditioning; type of heating and refrigeration plants, type and capacity of boilers and cooling equipment, fuel, type of burners, fuel storage, heaters, feed water pumps and heaters, thermal insulation, type of heating medium, supply and return piping, radiation, unit heaters, radiant heating, principal air conditioning equipment types, special features.
- 3.3.3.2.28** Electric work; service connection, location, institution or public utility, overhead or underground, transformers including type and location, types of conduit and wiring, types of fixtures, location of main switchboard, specials such as doctors and nurses call systems, radio, fire alarm, telephone, public address, emergency lighting and wiring, emergency or other generators, special features, including Master TV information retrieval and/or data processing system.
- 3.3.3.2.29** Elevators, escalators, dumbwaiters and platform lifts; capacities, speed, travel in feet, landings, operation, controls, platform sizes, machine type and location, car and entrance finishes, signals.
- 3.3.3.2.30** Other built-in equipment, types and materials.
- 3.3.3.2.31** Special features.

3.3.4 Estimating Requirements

- 3.3.4.1** During the Design Development Phase, cost estimates shall be further developed in as much detail as the Drawings and Specifications permit.
- 3.3.4.2** Cost estimates in the Design Development Phase shall be prepared by a competent, outside estimator. The estimator is subject to the **City's** approval.
- 3.3.4.3** A total cost estimate, formatted to correspond to each section of the Specifications, shall be included along with costs for major project components.

- 3.3.4.4 The estimate shall reflect the current construction cost. The total cost shall include a contingency factor, as jointly determined by the **A/E Professional** with the **City**. The anticipated bid date will be verified by the **City** with the **A/E Professional** input. The **A/E Professional** shall include all inflation/escalation factors to the midpoint of the proposed construction.
- 3.3.4.5 Summary sheets in Excel format. Provide a supplement to the cost to report the following:
- 3.3.4.6 The date that the estimate was prepared, i.e. the Value Date.
- 3.3.4.7 The anticipated bid date.
- 3.3.4.8 The CPPD Project name and CPPD Project number.
- 3.3.4.9 The title and location of the Project.
- 3.3.4.10 The name of the **A/E Professional**.
- 3.3.4.11 The name of the Estimator.
- 3.3.4.12 The site development cost, including all utilities, excluding land lease and purchase costs.
- 3.3.4.13 The building cost including fixed equipment.
- 3.3.4.14 The gross and net square footage of the building and of all program spaces and other spaces in the Project.
- 3.3.4.15 The net square foot cost of the building.
- 3.3.4.16 Indicate the ratio of net to gross square footage.
- 3.3.4.17 Unit user cost per student, per bed, per inmate, etc. as applicable.
- 3.3.4.18 Estimated number of days required for construction of the Project.

3.4 CONSTRUCTION DOCUMENT PHASE. If Construction Documents are part of a Project, the following shall apply:

3.4.1 General Requirements

- 3.4.2 Meeting notes: The **A/E Professional** shall compile meeting notes for every meeting with the **City**, which shall be distributed by the **A/E Professional** to all attendees no later than five (5) business days after the meeting.
- 3.4.3 There will be a minimum of three (3) submissions required in this phase: one at 60% complete, one at 95% complete, and a final at 100% complete.

- 3.4.4** The 60% Submission shall include:
- 3.4.5** The Basis of Design that accompanied the Outline Specification in the Design Development Phase shall be updated and expanded to include all Architectural, structural, fire protection, plumbing, mechanical, electrical and civil calculations for the project.
- 3.4.6** Detailing information for each major component of the building shall be sufficient to indicate approach and relation to other affected components e.g., doors to partitions, windows to wall construction, etc.
- 3.4.7** Keying shall be sufficient to allow the CPPD to make his or her way through the set.
- 3.4.8** Cover sheet shall include list of drawings.
- 3.4.9** Interior Materials Color Boards shall include all samples of interior materials labeled and mounted to indicate relative areas and relative location.
- 3.4.10** Submit typed legend identifying typical areas and their materials. Information should include: material name, manufacturer, color name/number and finish.
- 3.4.11** Colored interior elevations and perspectives of major and typical spaces.
- 3.4.12** Large scale plans of all mechanical and electrical spaces with equipment dotted in.
- 3.4.13** Specifications in the current CSI MasterFormat, including all sections to be included in final specifications developed to include a list of all materials in the building with their manufacturers. Identify all specifications sections that require submission of filed sub-bids.
- 3.4.14** Identify all proposed alternates by inclusion in a project manual section to be titled "Alternates". Alternates shall be listed in order of priority as approved by the **City**.
- 3.4.15** Code Analysis:
- 3.4.15.1** The **A/E Professional** and the **A/E Professional's** Consultants shall provide final code analysis. Any deviation of methods of compliance from the Schematic Design Phase shall be indicated.
- 3.4.15.2** The **A/E Professional** shall ensure that the Mechanical Engineer will provide compliance with the energy code.
- 3.4.16** The **A/E Professional** shall ensure that the entire design, including the work of all of the **A/E Professional's** Consultants, has been reviewed and coordinated based upon the most recent specifications, plans, drawings and other information, so as to eliminate any plan, dimensional or other conflicts between the **A/E Professional's** design and that of the various Consultant disciplines, as well as between each Consultant discipline and all others. Examples of such coordination requirements include, but are not limited to: consistency of building plans and elevations between architectural, mechanical, electrical, fire protection, fire alarm and any other applicable disciplines; verification that the spatial requirements of all engineered systems and equipment do not conflict with each other and that they conform to the dimensions provided architecturally (such as ductwork, plumbing, fire protection, lighting, fire alarm, and other electrical equipment required to fit at any point within the

space above a suspended ceiling); or provision of appropriate chases or wall cavity space to accommodate concealed equipment or vertical or horizontal runs of engineered systems.

3.5 Drawing Requirements

3.5.1 Cover sheet showing drawing index, symbols, abbreviations, notes, locations map.

3.5.2 Site drawings shall be complete to define the extent and detail of site work. Show the following:

3.5.2.1 Layout and location of all proposed work including buildings, structures, retaining walls, parking, walls and all other site improvements, with details.

3.5.2.2 Existing and proposed grades and contours including floor elevations, existing structures and topography, survey base line, bench marks and boring locations.

3.5.2.3 Landscaping and planting.

3.5.2.4 All utility service lines, systems and structures for electricity, gas, oil, water, steam, telephone, sanitary and storm drainage including size, composition, grades and directions of flow. A separate site drawing to show utilities on projects with extensive layouts and details shall be required.

3.5.2.5 The **A/E Professional** shall certify, in writing, to the **City** that all applicable local, state and federal officials have been contacted regarding each utility connection and that the department responsible for permits or connection approval has agreed to the systems use.

3.5.2.6 Contract Limit Line and storage area for construction materials.

3.5.2.7 All Existing foundations, obstructions and other physical characteristics of the Site that may affect the construction work.

3.5.2.8 A current Site survey.

3.5.3 Include demolition drawings and temporary work required.

3.5.4 Architectural drawings shall include at a minimum:

3.5.4.1 Floor plans of each floor, including basement and attic with room and corridor dimensions, wall thickness, column locations, floor elevations, mechanical and electrical openings, door and window designations, partition types, floor materials, built in furniture and equipment, keyed to other architectural drawings. All rooms numbered.

3.5.4.2 Large-scale floor plans where required to illustrate detailed requirements of rooms.

3.5.4.3 Roof plans showing openings, drainage, slopes, expansion joints and all projections, including equipment.

3.5.4.4 Key plans on all floor plans and section drawings, where appropriate.

- 3.5.4.5 Building sections as required showing spatial organization of building, but no less than one longitudinal and one transverse.
- 3.5.4.6 Building elevations. All building elevations shall be fully developed and hidden elevations shall be shown. Elevations shall be shown clockwise, unfolded starting at main entrance elevation.
- 3.5.4.7 Full height wall sections indicating dimensions, flashing, anchorage, reinforcing, coursing, cladding, and all other conditions at wall, roof, foundation, interior floors, etc.
- 3.5.4.8 Exterior details, for roofing, flashing, expansion control and construction joints, water-stops and other details showing all conditions both vertical and horizontal, including schedules.
- 3.5.4.9 Door, window, entrance, and storefront, schedules, and details.
- 3.5.4.10 Vertical circulation plans, sections and details including stairs, elevators, escalators, conveyors, dumbwaiters.
- 3.5.4.11 Interior Elevations of all significant and typical spaces.
- 3.5.4.12 Interior details including casework, paneling surfacing and acoustical treatment.
- 3.5.4.13 Reflected ceiling plans coordinated with fire protection, mechanical and electrical drawings, and ceiling detail.
- 3.5.4.14 Schedules, clearly defining new or existing:
 - 3.5.4.14.1 Doors
 - 3.5.4.14.2 Equipment, e.g. for service
 - 3.5.4.14.3 Partitions
 - 3.5.4.14.4 Finishes
- 3.5.4.15 The **A/E Professional** shall prepare color sketches of elevations if any significant changes have been made to the originally approved materials/color.
- 3.5.5 Structural drawings shall indicate the following:
 - 3.5.5.1 Boring plans with dates, elevation water level, and bottom grades for footings and slabs plotted.
 - 3.5.5.2 Foundation plan with bottom grades showing layout of all footings, walls, slabs on grade including reinforcing, grade beams, and columns; include design soil bearing pressures and live loads for each area.
 - 3.5.5.3 Floor and roof plans of structural systems including framing, grades of finished floors

and depressed areas, with locations and dimensions for all openings. Also indicate design floor loads.

3.5.5.4 Complete foundation wall elevation and typical sections, with reinforcing indicating location, dimensions and grades for all footings, steps and wall openings.

3.5.5.5 Complete details and section with dimensions for all construction including expansion and construction joints, reinforcing and other embedded items.

3.5.5.6 Schedules with dimensions for all lintels, beams, joists and columns.

3.5.5.7 Unless detailed on the Drawings, the following information shall appear in the general notes. Sheet S-1: class and 28 day strength of concrete for each portion, structural steel and concrete reinforcing design stresses for each type of structural member, concrete cover for each type of structural member, shrinkage and temperature steel requirements, reinforcing laps for main reinforcing and temperature steel; bend-point, cutoff, and hook locations for all members, minimum beam and lintel bearing. Reinforcing steel fabrication shall be in accordance with most recent ACI, "Manual of Standard Practice for Detailing Reinforced Concrete." Structural steel fabrication shall be in accordance with the AISC "Manual of Steel Construction."

3.5.6 Fire protection drawings shall indicate standpipe systems, sprinkler systems, access panel, fire pumps, accessories, and piping.

3.5.6.1 Fire protection work, other than site work, shall not be combined on the same sheets with the Plumbing, HVAC, Electrical, or other drawings except with the prior approval of the **City**.

3.5.7 Plumbing drawings shall indicate the following:

3.5.7.1 All work done by the Plumbing Subcontractor, which includes all water, gas, air, vacuum, medical gases, sanitary and storm wastes, and accessories. Foundation drain lines are the work of the General Contractor and shall not be indicated on the Plumbing Drawings. Site utilities shall be indicated on the utility drawings.

3.5.7.2 Plumbing work, other than site work, shall not be combined on the same sheets with the Fire Protection, HVAC, Electrical, or other drawings except with the prior approval of the **City**.

3.5.7.3 Trapping and venting of all plumbing fixtures, including floor drains.

3.5.7.4 Water and gas supply sources, storm and sanitary discharge mains.

3.5.7.5 All piping shall be carefully sized and all sizes shall be indicated on drawings and riser diagrams. Indicate all directions of flow and pitch on piping.

3.5.7.6 All accessories, valves, fixtures including all drinking fountain, grease traps for kitchen waste and all necessary panels, identified as to type and size.

3.5.7.7 Acid waste and vents for laboratories.

- 3.5.7.8** Plumbing legend and/or graphical symbols on the first sheet of the plumbing drawings in accordance with the American National Standards Institute (ANSI).
- 3.5.7.9** Plumbing riser diagrams for structures two or more stories in height above the ground level.
- 3.5.7.10** Domestic water booster pumps, boiler feed water, meter location, hose bibs.
- 3.5.7.11** Hot water: storage tanks, piping material, hanger details.
- 3.5.7.12** Backflow preventers, and cleanouts. Verify that access and clearance provisions for periodically inspected devices, including backflow prevention, is adequate to satisfy requirements of inspecting agencies.
- 3.5.8** Heating, Ventilating and Air Conditioning Drawings shall indicate the following:
 - 3.5.8.1** Site utilities shall be indicated on the utility drawings.
 - 3.5.8.2** HVAC work, other than site work, shall not be combined on the same sheets with Fire Protection, Plumbing, Electrical, or other drawings except with the prior approval of the **City**.
 - 3.5.8.3** All piping and ductwork systems shall be located and sized.
 - 3.5.8.4** All systems shall be sized at all reductions and riser diagrams of piping and duct systems shall be indicated.
 - 3.5.8.5** All directions of flow and pitch on piping, and direction of flow, volumes for duct systems shall be indicated.
 - 3.5.8.6** All large items of equipment shall have sufficient servicing and/or replacement space indicated on drawings.
 - 3.5.8.7** All equipment, accessories, valves and dampers with all necessary access panels, identified as to type and size. Access panels, where required for access to valves and dampers etc., shall be indicated on drawings.
 - 3.5.8.8** Cooling system pumps, chillers, cooling towers, air handling units, ductwork system and dampers, fan details, temperature control system, air and hydronic balancing equipment, and schedules shall be indicated.
 - 3.5.8.9** Cooling tower design shall be indicated on the drawings showing site location, elevations and floor plan of equipment layout and typical flow diagram as related to the total HVAC system.
 - 3.5.8.10** All fire and smoke dampers, access panels and doors.
 - 3.5.8.11** Mechanical room designs:
 - 3.5.8.11.1** Vent pipes for safety valves, relief valves, back-pressure valves and tanks shall be extended above flat roofs in accordance with all governing

authorities.

3.5.8.11.2 In all designs for boiler and refrigeration plants, include a complete floor plan indicating location of all major mechanical equipment and sufficient service space.

3.5.8.11.3 In designs of new and/or replacement boiler and refrigeration plants, provide a flow diagram detailing steam or hot water distribution systems, return systems, including all existing equipment and their function, as well as any proposed expansions with all necessary instrumentation and controls.

3.5.8.12 All ductwork shall be shown double line unless otherwise approved in writing by the City.

3.5.9 Electrical Drawings shall indicate the following:

3.5.9.1 Site utilities shall be indicated on utility drawings.

3.5.9.2 Electrical work, other than site work, shall not be combined on the same sheets with Fire Protection, Plumbing, HVAC, or other drawings except with the prior approval of the City.

3.5.9.3 General arrangement: Outline layout of each floor. Typical sections through the structure, floor and ceiling heights and elevations, and type construction, including concrete pads shall be indicated. Indicate interface with other systems. Identify any work by the General Contractor or other trades.

3.5.9.4 Interior lighting system: Type or wiring, light fixture schedules, location and mounting heights of all fixtures, receptacle and switch outlets, sizes and types of all lamps, conduits, all other accessories and riser diagrams shall be indicated on the drawings. Indicate details and method of supporting electrical fixtures and conduits. **A/E Professional** shall specify that all electrical lighting fixtures be supported from the building structure, and shall be independent of ducts, pipes, ceilings and their supporting members.

3.5.9.5 Power system: Locations, types and method of control for all motors, heaters, appliances, controllers, starters, branch circuits, feeder conductors and conduits. Indicate riser diagrams. Show details and indicate method of supporting electrical conduit. For larger projects, thermostats and control wiring are normally covered under the HVAC sub-contract.

3.5.9.6 Signal systems: Locations and types of all outlets and equipment, service connections, wiring diagrams, all other essential details.

3.5.9.7 Services: Location and details of all services, whether overhead or underground, feeder sizes, plans and elevations of switchgear and transformers, metering and service switchboard arrangements, wiring and ground fault diagram and bus ducts.

3.5.9.8 General and sub-stations: Location, size, method of connection and protection of all generators, transformers, exciters, motor generators, switch gear, and associated equipment, current characteristics and equipment capacities. Indicate equipment connections by means of one line and/or wiring diagrams and schedule all major items of equipment and all instruments.

- 3.5.9.9** Underground work: The size and locations of manholes and types of cables, number, size and location of ducts, locations, sizes and types of cable supports, fireproofing, duct line profile, and one line diagram of connections. All underground chambers, including manholes and pull-boxes, shall be constructed of cast in place or one-piece pre-cast concrete.
- 3.5.9.10** Pole line work: Location, length, treatment and class of poles, guying, cross- arms, insulators, circuiting, transformers, protective and switching devices, lightning arresters, special structures, diagrams, current characteristics and grounding.
- 3.5.9.11** Exterior lighting: Location size, and type of transformers, luminary, poles, light standards, cables, ducts, and manholes, details of control equipment and connection diagrams.
- 3.5.9.12** Emergency system details including transfer switch, type of fuel.
- 3.5.9.13** One line diagram indicating load KVA, and available short circuit amperes at each transformer, switchboard, distribution panelboard, branch circuit panelboard, and at major pieces of equipment.
- 3.5.9.14** Riser diagrams for all systems.

3.6 Project Manual Requirements

- 3.6.1** The format for the specification shall be the current edition of the CSI Masterformat.
- 3.6.2** Cover sheet to be provided by **City**.
- 3.6.3** The following general information applies to the development of the final Specification:
 - 3.6.3.1** Describe the extent of the work, the materials and workmanship, in sufficient detail to permit fixed-price bids in open competition for construction of the Project in compliance with M.G.L. Chapter 149, §§44A-44J and Chapter 30, §39M, and include the work under the proper Section. If any portion of the work included in a Section of the Specifications is to be performed by a trade covered by another Section, there shall be clear and distinct cross-referencing between the Sections. Merely to state "by others" is not acceptable.
 - 3.6.3.2** Provide for full competition for each item of material to be furnished. Bidders shall not be required to submit proposed "or equal" products for approval prior to the bid date.
 - 3.6.3.3** Comply with M.G.L. Chapter 30, §39M by providing for either a minimum of three manufacturers of material or a description of material which can be met by a minimum of three manufacturers, or for an approved equal to that named or described.
 - 3.6.3.4** Specify materials mined or manufactured in Massachusetts whenever possible.
 - 3.6.3.5** Do not use general clauses intended to be all-inclusive in lieu of complete descriptions.
 - 3.6.3.6** Do not duplicate standard requirements that are contained in the contract form.

3.6.3.7 Use consistency throughout, the word "will" shall be used to designate what the **City** or the **A/E Professional** can be expected to do, and the word "shall" will be used to designate what is mandatory for the Contractor to do.

3.6.3.8 Use the same term throughout for the same subject, and the term shall be the same as that used on the drawings.

3.6.3.9 Do not use the term "etc." or any other catch phrase.

3.6.3.10 Avoid such terms as "to the satisfaction of the Designer", "as directed by the Designer", "as approved" and "as required".

3.6.3.11 Specify work in appropriate Sections according to local trade jurisdiction.

3.6.3.12 Avoid the use of the following symbols:

<u>Symbol</u>	<u>Use Instead</u>
#	number or pounds
%	percent
"	inch
x	by
'	feet
+	plus
-	minus
o	degree
/	per or at

3.6.3.13 In Sections for which filed sub-bids are required, refrain from using such terms as "the Contractor," the "Heating Contractor" or "the Plumbing Contractor," but where necessary for clarity refer to the "HVAC Subcontractor," the "General Contractor" and so on.

3.6.3.14 Do not give numbers both in words and figures. Numbers less than 10 shall be written in words, 10 and higher numbers shall be written in figures. In expressing dimensions, figures such as 2 inches, 7 feet, 6 inches, shall be used.

3.6.3.15 Each filed Sub-bid Section shall detail all labor and materials required by the particular sub-trade and list, by number, those drawings indicating work of that sub-trade. In addition, list drawings indicating work of a particular trade that appear on drawings that are not customarily included in the work of that trade.

3.6.3.16 Do not specify that a product or system shall require pre-qualification for use prior to bidding.

3.6.4 Special Specification Requirements:

3.6.4.1 Proprietary products shall not be specified except as provided by Section 39M, Chapter 30 of the Massachusetts General Laws.

- 3.6.4.2** Alternates, if approved in writing by the **City**, shall be properly described and cross-referenced in the specifications and drawings. An alternate proposal sheet shall be prepared by the **A/E Professional** for insertion into the Contract Form.
- 3.6.4.3** Allowances are prohibited by M.G.L. Chapter 149, §44G.
- 3.6.4.4** Unit price items, if permitted or ordered by the **City**, shall be properly described in the Specifications. A unit price proposal sheet shall be prepared for the General Contractor's proposal in accordance with the form shown herein. When a unit price item is the work of a Filed **City** Sub-Bidder, information shall be included in the applicable Section with instructions for the Sub-Bidder to insert the unit price amounts in the proposal sheet attached to the Form for Sub-Bid.
- 3.6.4.5** Staging, scaffolding cutting and patching, and demolition work allocation policy and proposed language shall be discussed with the **City** at the beginning of Construction Documents Phase.
- 3.6.4.6** Specification Writers shall consult with CPPD for any special requirements to provide within specifications sections for warranties, maintenance services, maintenance instructions, replacement materials and other requirements defined therein.

3.7 Estimate and Analysis of Construction Cost

- 3.7.1** The **A/E Professional** upon written direction from the **City**, and when the Drawings and Project Manual have become sufficiently advanced, shall provide to the **City** an estimate and analysis of the construction cost and duration in accordance with the Contract requirements.
- 3.7.2** During the Construction Documents Phase, cost estimates shall be in complete detail with totals for each Section of the Specifications as noted. Cost estimates shall include complete breakdown of each Section including Fire Protection, Plumbing, HVAC, and Electrical, indicating materials, labor, units, unit costs and total cost. The total cost shall include in the labor item all insurance, state and federal payroll taxes, and any payments to unions. The total cost for each Section shall include all General Contractors' and Subcontractors' overhead and profits.
- 3.7.3** Cost estimates in the Construction Documents phase shall be prepared by competent estimators. The estimator is subject to the **City's** approval.
- 3.7.4** The date of the estimate shall be the date of the submittal. The detailed estimate cost shall not be projected.
- 3.7.5** The summary sheets shall be developed, which shall contain the following:
 - 3.7.5.1** The date that the estimate was prepared, i.e. the Value Date.
 - 3.7.5.2** The anticipated bid date.
 - 3.7.5.3** The CPPD Project Name and CPPD Project Number.
 - 3.7.5.4** The title and location of the project.

- 3.7.5.5** The name of the **A/E Professional**.
- 3.7.5.6** The name of the Estimator.
- 3.7.5.7** The site cost (including all utilities).
- 3.7.5.8** The building cost (including fixed equipment).
- 3.7.5.9** The estimated construction cost of each Section of the work, totaled.
- 3.7.5.10** The costs of Item 1 and Item 2 work, included in the General Contractor's bid forms, shall be individually totaled.
- 3.7.6** In order to maintain uniformity in computation and consistency of both the gross and net square foot areas of buildings, they shall be determined in the following manner:
 - 3.7.6.1** Gross Area: The area included within the outside faces of the exterior walls for all stories. Custodial areas such as janitor closets, building maintenance and building employees' locker rooms, circulation areas such as corridors, lobbies, stairs, and elevators, and mechanical areas such as those designated to house mechanical and electrical equipment, utility services, and non-private toilets shall be considered as part of the gross area, but not part of the net area.
 - 3.7.6.2** Net Areas: In general, those areas that have a specific assignment and functional use as determined by the type of facility, including, but not limited to, special use areas such as cafeterias, auditoriums, bed patient rooms and classrooms. These shall be measured from the inside finish of permanent outside walls to the inside finish of corridor walls, and to the center line of intermediate partitions.
 - 3.7.6.3** All three Submissions in this Phase shall include an updated space measurement analysis in Excel format of all program spaces and all other floor areas in the Project showing the square footage of each, and indicating any variations from the approved Program, if any, and the approved Design Development Plans.
 - 3.7.6.4** The net square foot cost of the building.
- 3.7.7** The cubage of the building will generally not be required, except for demolition projects.
- 3.7.8** The cubage of demolition projects shall be the gross area of the building times the following:
 - 3.7.8.1** Heights: From bottoms of lowest floors to highest points of flat roofs, or to half-heights of pitched roofs.
 - 3.7.8.2** Cubage of Porches: One-half height multiplied by area.
 - 3.7.8.3** Cubage of Steam Trenches and Utility Tunnels: One-half of volume.

3.8 Bidding and Award Phase.

_____ House Doctor Contract

Year One _____

- 3.8.1** Upon the approval by the **City** of the Construction Documents, the Designer shall, without an increase in Compensation assist the **City** in the preparation of the Bidding documents and in the advertisement for Bids. The Awarding Authority will reproduce, advertise and distribute the Bid Documents necessary for the procurement of the Construction Contract.
- 3.8.2 Commencement.** The Bidding and Award Phase commences on the date the Invitation to Bid is first advertised pursuant to M.G.L. c. 149, §44J, or M.G.L. c. 30, §39M, and ends on the date the Construction Phase begins.
- 3.8.3 Additional Bidders.** The **A/E Professional** shall assist the **City** in obtaining bids if, in the opinion of the Contracting Department, an insufficient number of persons requested the Project Manual. The **A/E Professional** will notify “eligible” and “responsible” persons (as those terms are defined in the M.G.L. c. 149, §44A and referred to in M.G.L. c. 30, §39M) of the Invitation to Bid.
- 3.8.4 When Lowest Bid Exceeds Total Construction Cost.** If the lowest bona fide bid by a Contractor exceeds the total construction cost of the Project as set forth in the approved Statement of Probable Construction Costs by more than ten percent (10%), then upon the request of the **City**, the **A/E Professional** will revise the Plans and Specifications in consultation with the **City** to reduce or modify the quality or quantity, or both, of the Work so that the total construction cost of the Project will not exceed the total construction cost set forth in the Statement of Probable Construction Costs by more than ten percent (10%). All revisions pursuant to this paragraph shall be at the **A/E Professional’s** sole cost and expense (which cost and expense include, but are not limited to the **A/E Professional’s** time, the cost of reprinting the Project Manual, and the cost of re-advertisement of the Project).
- 3.8.5 Pre Bid Conferences.** The **A/E Professional** shall attend all pre-bid conferences.
- 3.8.6 Investigation of Bidders.** The **A/E Professional** shall investigate, at minimum, the lowest Bidder. The investigation shall include, but is not limited to, reviewing the files maintained by the Division of Capital Asset Management, or any other governmental agency charged with maintaining such documents related to such Bidder, telephoning or writing owners of the Bidder’s prior projects, telephoning or writing **A/E Professionals** from such prior projects, visiting the sites of such other projects and checking all other appropriate references. The **A/E Professional** shall provide the **City** with a detailed letter of approval or disapproval of such Bidder. The letter must include relevant language from the appropriate state laws regarding the eligibility and responsibility of Bidders (i.e., M.G.L. c.149, §44A(1), M.G.L. c. 30, §39M(c), or, if appropriate, M.G.L. c. 29, §29F). If the **A/E Professional** disapproves of the lowest Bidder, then the **A/E Professional** must investigate the next lowest Bidder in the same manner described above, and continue to investigate each successive low Bidder until a Bidder is approved. For every Bidder investigated, the **A/E Professional** must provide the **City** with a detailed letter as described above.
- 3.8.7 Preparation of Contract.** To the extent required, the **A/E Professional** shall assist the Contracting Department in the preparation of the construction contract.

3.9 Services During the Construction Administration Phase

3.9.1 Written Components

3.9.1.1 The **A/E Professional** shall provide assistance to the **City** during the construction of the Project and shall administer the construction contract for the Project in accordance with the scope provided in this Contract.

3.9.2 The duties, responsibilities and limitations of authority of the **A/E Professional** shall not be restricted, modified or extended without the written agreement of the **City** and the **A/E Professional**. The **A/E Professional** shall advise and consult with the **City** during construction until the **City** has made the final payment to the Construction Contractor. The **A/E Professional** has authority to act on behalf of the **City** only to the extent provided in the Contract Documents unless otherwise modified in writing.

3.9.3 The **A/E Professional** shall ensure that he fulfills his obligations with regard to the provisions and timing requirements of M.G.L. Chapter 30, §39P during construction, concerning his making decisions on interpretations of the specifications, approval of equipment, material or any other approval, or progress of the construction. The **A/E Professional** shall obtain the written endorsement of the Awarding Authority on all written decisions or interpretations that are to be issued to the Construction Contractor, prior to issuance.

3.9.4 The **A/E Professional** shall prepare all necessary supplementary details and clarifications, review and approve all materials and Shop Drawings and other Submissions of the Construction Contractor as required by the Construction Contract for conformance with the design concept of the Project, and for compliance with the information given in the Construction Documents Phase and; review and approve standards of workmanship and, in the case of unusual or novel aspects of the Work, review and approve methods and techniques of construction; and check, report on, and, upon approval of the **City**, make the necessary details for changes in the Work.

3.9.5 The **A/E Professional** shall prepare and issue formal conference notes of all meetings attended by the **A/E Professional** with the Construction Contractor, and of any other meeting as requested by the Awarding Authority, whether representatives of CPPD attend or not. The **A/E Professional** shall issue these formal conference notes within three (3) business days of the meeting.

3.9.6 The **A/E Professional** shall assist the **City** in any necessary meetings, reviews or presentations conducted prior to the start of construction in the field.

3.9.7 The **A/E Professional** shall, in addition to attending job progress meetings, visit the site at such times as the progress of the construction requires or as otherwise agreed by the **City** and **A/E Professional** in writing but not less than once per week, become familiar with the progress and quality of the Work, and to see that the Work is being performed by the Construction Contractor in accordance with the requirements of the Construction Contract; the **A/E Professional** shall also ascertain whether the Construction

3.9.8 Contractor is maintaining accurate up-to-date As-Built Drawings at the Site, in accordance with the terms of the Construction Contract and report all of its observations and conclusions in writing to the **City**. If the **A/E Professional** determines that the Construction Contractor is not maintaining these drawings, the **A/E Professional** shall notify the **City** in writing, accordingly. The **A/E Professional** shall require that each Consultant employed

make visits to the Project Site, no less frequently than once a week, during the progress of any Work to which that Consultant's services relate, and to report their observations and conclusions in writing to the **A/E Professional** with a copy to the **City**. Reports of the **A/E Professional** shall also reflect the **A/E Professional's** review of all reports of their Consultants, and shall address and comment on said Consultant reports.

- 3.9.9** In regard to Shop Drawing Control, the **A/E Professional** shall review, process and track Shop Drawing Submittals from the Construction Contractor in accordance with the general guidelines as follows.

3.10 Shop Drawing and Submittal Control Schedule

- 3.10.1** After the Construction Contract has been awarded, the Construction Contractor will provide Shop Drawing Control Schedule information as required, in a format acceptable to the **City**. This information will be provided to the **A/E Professional** and will consist of the following for each planned Shop Drawing Submission:

3.10.1.1 Technical Specification Division number

3.10.1.2 Equipment/Material Drawing Title/Description

3.10.1.3 Manufacturer/Supplier

3.10.1.4 Scheduled Submittal Date

- 3.10.2** Upon receipt of this information, the **A/E Professional** will conduct a thorough review to determine such factors as, but not limited to:

3.10.2.1 Has the Construction Contractor identified all required shop drawing submittals

3.10.2.2 Are any manufacturers/suppliers recommended which the **A/E Professional** objects to

3.10.2.3 Are the planned submittal dates in support of the Construction Contractor's Progress Schedule. This review must be completed within ten (10) business days.

- 3.10.3** Upon completion of this review, the **A/E Professional** will provide comments to the Construction Contractor in the case of deficient information, and enter all acceptable/correct information into the Shop Drawing Control Schedule. When all information has been entered into this Schedule, the **A/E Professional** shall issue two (2) copies of the completed Schedule to CPPD, within five (5) business days after the completion of the **A/E Professional's** review.

- 3.10.4** The **A/E Professional** shall maintain/update the Shop Drawing Control Schedule throughout the entire Construction Contract period, and issue a progress status copy to CPPD every 2 weeks. The **A/E Professional** shall bring this Schedule to all Job Progress Meetings with the Construction Contractor, and shall present the status of all active and overdue submittals.

- 3.10.5** The **A/E Professional** shall ensure that the Shop Drawings, which are designated as requiring "CPPD Design Review" in the Shop Drawing Control Schedule, are submitted to CPPD Design Review prior to returning them to the Construction Contractor within the

time period specified by the **City**.

3.10.6 The **A/E Professional** shall provide one (1) copy of all shop drawing submittals clearly showing the **A/E Professional's** comments and disposition status which have been returned to the Construction Contractor, within three (3) business days of issuance to the Construction Contractor.

3.10.7 The **A/E Professional** shall coordinate all color selections proposed through shop drawings or other submittals, and any variations to previously approved color selections and shall review final color selections with the **City**. If directed by the **City** the **A/E Professional** shall provide the General Contractor/Painting Subcontractor with samples and color chips.

3.11 Meeting Notes

3.11.1 The **A/E Professional** shall compile typed meeting notes for every meeting with the **City**. These meeting notes shall be distributed by the **A/E Professional** to all attendees no later than three (3) business days after the meeting.

3.12 Change Orders

3.12.1 The **A/E Professional** shall consult with the **City** concerning Change Orders to the construction contract, if any, during the progress of the construction; and the **A/E Professional** shall prepare, process and review such change orders in accordance with the following:

3.12.2 Change Order Log. The **A/E Professional** shall maintain a Change Order Log form as approved by the **City** for the entire period of the Construction Contract. This form will be filled out by the **A/E Professional** and delivered to the **City** at every job progress meeting.

3.12.3 Change Order Proposals. Whenever, for any reason, the Contractor delivers a change order proposal to the **City** or to the **A/E Professional**, the **A/E Professional** shall promptly consult with the **City**. The **A/E Professional** shall inform the **City** of its concurrence with or rejection of the Construction Contractor's proposal in writing. The **A/E Professional** shall review and analyze all change order proposals and shall submit its report in writing to the **City** within five (5) business days after the **A/E Professional** receives the change order proposal. The **A/E Professional's** review and analysis shall address the following elements:

3.12.3.1 Entitlement Analysis determination if the Contractor's change order proposal is valid under the Construction Contract Documents.

3.12.3.2 Technical basis/rationale.

3.12.3.3 Reason for change.

3.12.3.4 Affected section(s) of the construction plans and specifications.

3.12.3.5 Applicable section/paragraph of Section 00 70 00 - General Conditions of the Construction Contract which governs or is applicable.

3.12.4 If requested by the **City**, the **A/E Professional** shall prepare an independent check estimate covering the scope of the proposed change, at no increase in Compensation for the services,

which will address cost as well as schedule impacts, as follows:

- 3.12.4.1** Analysis of prices/costs/wage rates for consistency with local standards and requirements of the Contract Documents.
- 3.12.4.2** Analysis of supporting data/backup substantiating all costs and schedule impacts.
- 3.12.4.3** Analysis of labor work hours (i.e. unit installation rates, proper crafts) and equipment requirements.
- 3.12.4.4** Analysis of all indirect and supplemental costs and fee calculations.
- 3.12.4.5** Determination of conformance of all pricing with the Construction Contract Documents requirements.
- 3.12.4.6** Analysis of scope of the change
- 3.12.4.7** Analysis of the impact on the Contractor's Progress Schedule, as determined by an analysis of the Progress Schedule.
- 3.12.5** Once a change order proposal has been accepted or agreed to by the **City**, the **A/E Professional** shall assist the **City** in the processing and execution of the Change Order.

3.13 Construction Progress Schedule Analysis

- 3.13.1** The **A/E Professional** shall submit to the **City**, in a form satisfactory to the **City**, weekly reports as to the progress of the construction and performance of the Work by the Construction Contractor. The **A/E Professional** shall perform Progress Schedule Analysis of the Construction Contractor's Schedule, in accordance with the general guidelines as follows:
- 3.13.2** The Construction Contractor is required to submit either Barchart or CPM-format Progress Schedules in accordance with the requirements of the construction contract documents, Specification Section 01 32 16 or 01 32 17 - Progress Schedule. The **A/E Professional** shall perform reviews and analyses of these submittals in accordance with the specification requirements (scope of review and timing provisions), and shall, as a minimum, address the following issues/elements in each Schedule Review as they relate to either Bar Chart or CPM Schedules:
 - 3.13.2.1** Conformance of the Schedule Submittals with the specification requirements.
 - 3.13.2.2** Determination of critical, and sub-critical paths.
 - 3.13.2.3** Inclusion of appropriate activities for all necessary activities by the **A/E Professional** and CPPD.
 - 3.13.2.4** Proper durations for all activities of the **A/E Professional** and CPPD.
 - 3.13.2.5** Inclusion of any float suppression techniques by the Construction Contractor in the Schedule.

3.13.2.6 Determination that the Schedule is in accordance with the Contract Time requirements of the construction contract.

3.13.2.7 Inclusion of the full scope of the Work in the Construction Contractor's Schedule.

3.13.2.8 Determination that all intermediate or completion milestones, as required by the construction contract, are included in the Schedule.

3.13.2.9 Inclusion of all Schedule supporting elements from the Construction Contractor (e.g., progress curve, labor profiles, etc.).

3.13.3 Upon completion of the **A/E Professional's** review of the Construction Contractor's Progress Schedule, the **A/E Professional** shall review the findings and results with the **City**. The **A/E Professional** shall then return the submittal to the Construction Contractor with all appropriate comments.

3.13.4 If the Construction Contractor fails to submit the Schedules as required by specifications within the time requirements as stated therein, the **A/E Professional** shall immediately notify the **City** in writing within two (2) business days of the required submittal date.

3.13.5 The **A/E Professional** shall maintain appropriate files of all Schedule reviews by submittal. These files shall be available to the **City** at all times.

3.13.6 The **A/E Professional** shall notify the **City** in writing as to who will perform the analyses of the general contractor's Schedule submittals as part of the Scope of Services for the Construction Administration Phase, prior to the receipt of the first Schedule. If the **City** objects to the proposed person, the **A/E Professional** shall propose a substitute, as either a person within the **A/E Professional's** employ, or as a Consultant.

3.14 Application for Payment

3.14.1 The **A/E Professional** shall upon receipt of applications for payment from the Construction Contractor, date stamp the same and shall, within three (3) business days of receipt, review, certify, sign and submit to the **City**, in a form satisfactory to the **City**, such certificates of progress as the **City** may require to enable the **City** to make payments to the Construction Contractor.

3.15 Operation and Maintenance Manuals

3.15.1 The **A/E Professional** shall review, process and collect all Maintenance Manuals and Drawings required to be submitted by the Construction Contractor, in accordance with the general guidelines as follows:

3.15.2 Upon Substantial Completion of the Work, the Construction Contractor shall submit all required Operation and Maintenance Manuals and Drawings, in accordance with the requirements of the construction contract documents, to the **A/E Professional** for review. The **A/E Professional** shall review these documents and return them to the Construction Contractor with any necessary comments. The Construction Contractor shall revise the

documents accordingly, until satisfactory to the **A/E Professional**, as evidenced by the **A/E Professional's** written approval.

- 3.15.3** The **A/E Professional** shall ensure that the Construction Contractor has submitted and prepared all manuals, instructions, guidelines, guarantees, certificates of inspection and all other required documents necessary for the maintenance and operation of all mechanical, electrical and instrumentation systems/equipment associated with the Project and all other identified in the construction contract documents.
- 3.15.4** Upon receipt of all required documents from the Construction Contractor, the **A/E Professional** shall deliver them to the **City** prior to the **A/E Professional's** recommendation for final payment to the Construction Contractor. In addition, the **A/E Professional** shall provide the **City** with a signed certification stating that all Maintenance and Operations Manuals and Drawings required by the construction contract documents for the Project are included in the documents delivered to the **City**.
- 3.15.5** Interior Finishes Handbook: Upon Substantial Completion of the Work, the **A/E Professional** shall provide two (2) copies of a handbook to the **City** and the Using Agency listing all paint and material colors/numbers, finish and type and their location throughout the Project.

3.16 Project Completion

- 3.16.1** The **A/E Professional** is required to assist the **City** with the completion of the Project, conduct semi-final and final inspections, and in making determinations that all Work has been completed in accordance with the Construction Contract documents. The **A/E Professional** shall, as a minimum, perform the tasks necessary to determine Substantial Completion and Final Completion of the Work in accordance with the general guidelines as follows:
 - 3.16.2 Contract Close-out Procedures:**
 - 3.16.2.1** Review record drawings provided by the Construction Contractor as described in the Construction Contract General Conditions.
 - 3.16.2.2** Upon notification by Construction Contractor that the Project is substantially complete conduct a semi-final inspection.
 - 3.16.2.3** Establish a final punch list and monetize same.
 - 3.16.2.4** Recommend amount of the Substantial Completion payment to the Construction Contractor.
 - 3.16.2.5** Obtain all operations and maintenance data as described in the previous Section.
 - 3.16.2.6** Obtain all guarantees and warranties beyond the normal one-year guarantee.
 - 3.16.2.7** Ensure that appropriate documentation is submitted and proper final inspections have taken place to secure an Inspectional Service Department (ISD) Occupancy Permit.
 - 3.16.2.8** Sign final acceptance papers. Sign an affidavit of compliance that certifies that the

construction has been inspected and that it complies with the construction contract documents and all the regulations of the Massachusetts Building Code, as required by the **City**.

- 3.16.2.9** If required by the **City**, assist the **City** by evaluating the Construction Contractor's performance as required by the Commonwealth's Division of Capital Asset Management (DCAM) and submit the evaluation to the **City**.

3.17 Construction Contract Disputes

- 3.17.1** The **A/E Professional** shall promptly inform the **City** in writing of any and all disputes submitted by the Construction Contractor within seven (7) days of any such submission.

3.18 Project Record Documents

- 3.18.1** Within thirty (30) days after Substantial Completion of the Work, the **A/E Professional** shall deliver to the **City** in a format approved by the **City** one (1) complete set of Record Documents. The **A/E Professional** shall review, process and collect all Record Documents associated with the construction of the Project, whether they are to be developed by the **A/E Professional** or the Construction Contractor, in accordance with the following general guidelines.

- 3.18.2** Upon Substantial Completion of the Work, the Construction Contractor shall submit the following Record Documents to the **A/E Professional** for review. The **A/E Professional** shall review these documents and return them to the Construction Contractor with any necessary comments. The Construction Contractor shall revise the documents accordingly, until satisfactory to the **A/E Professional**, as evidenced by the **A/E Professional's** written approval endorsed thereon the Record Document. The **A/E Professional** shall certify in writing to the **City** that all Record Documents accurately reflect the Project as built for all trades/disciplines. The Record Documents shall consist of, but not be limited to, the following types of data:

3.18.2.1 Contract Drawings

3.18.2.2 Contract Specifications

3.18.2.3 Addenda

3.18.2.4 Change Orders

3.18.2.5 Field Orders from the **A/E Professional**

3.18.2.6 Test Records

3.18.2.7 Construction Photos

3.18.2.8 All approved Submittals including all Shop Drawings, properly annotated

- 3.18.3** After the **A/E Professional** has approved the Construction Contractor's Record Documents, the **A/E Professional** shall instruct the Construction Contractor to make reproducible transparencies of Record Drawings on .004 mil polyester base mylar, using a film negative.

These reproducibles shall be a wash- off process. Diazo or sepia process will not be acceptable.

- 3.18.4** The **A/E Professional** shall periodically verify during the progress of the Construction Contractor's work that the contractor is preparing and maintaining the required Project Record Document. If the **A/E Professional** determines that the Contractor is not preparing and maintaining these Documents, the **A/E Professional** shall so inform the **City** in writing within seven (7) days of this determination.
- 3.18.5** The **A/E Professional** shall have the authority to reject any Work that does not conform to the construction contract documents.
- 3.18.6** The **A/E Professional** shall not be responsible for construction means, methods, techniques, sequences or procedures, other than in connection with unusual or novel aspects as approved by the **A/E Professional**, or for safety precautions and programs in connection with the Work.
- 3.18.7 City Generated Forms and Documents.** The **City** shall provide the **A/E Professional** with copies of all **City** generated forms and documents intended to be included in the Project Manual. The **A/E Professional** will include these forms and documents in its Project Manual. The **A/E Professional** may propose changes to these **City** generated forms and documents; however, implementation of such changes is subject to the unilateral approval of the **City**. No changes may be made to such documents without the prior written consent of the **City**. The **A/E Professional** shall prepare and submit to the **City** for approval the entire Project Manual. The **A/E Professional** shall, to the best of his/her ability, immediately inform the **City** if any documents are missing or deficient.
- 3.18.8 Addenda.** All addenda shall be issued by the Contracting Department; however, at the Contracting Department's sole discretion, the **A/E Professional** may be called upon to prepare a draft of any such addenda. Any corrections to the Construction Documents which require an addendum will be made by the **A/E Professional** at no charge to the **City**.
- 3.18.9 Printing of Project Manual.** The **A/E Professional** must provide the **City** with a final draft of the Project Manual and obtain approval from the **City** prior to printing. The **A/E Professional** will be responsible for the printing of the Project Manuals unless the **City** instructs the **A/E Professional** otherwise. The cost of producing such Project Manuals will be passed onto the **City** at cost. Any changes required to be made to the Construction Documents as a result of errors by the **A/E Professional** or persons within its control will be promptly corrected at no cost to the **City**. The **A/E Professional** shall make its best efforts to print Project Manuals on paper containing a minimum of twenty percent (20%) post-consumer content.
- 3.18.10 Packaging the Project Manual.** The **A/E Professional** will require the printer of the Project Manual to wrap each set of Plans in a brown wrapper, or, if the Plans are small in number, fold each set of Plans and insert one set into each Project Manual.
- 3.18.11 Delivery of Project Manual.** The **A/E Professional** will use its best efforts to ensure that the Contracting Department receives the number of Project Manuals requested by the Contracting Department no later than 3:00 p.m. on the day prior to the first day of

advertisement of the Invitation to Bid.

3.18.12 Adjustment to Statement of Probable Construction Cost. The **A/E Professional** shall advise the **City** in writing of any adjustments to Statement of Probable Construction Cost indicated by changes in requirements or general market conditions.

3.19 CONSTRUCTION PHASE - ADMINISTRATION OF THE CONSTRUCTION CONTRACT.

If Administration of the Construction Contract is part of a Project, the following shall apply:

3.19.1 Commencement. The Construction Phase commences with the full execution of the contract for construction and terminates on the date of expiration of all of the guarantees and warranties provided by the Contractor to the **City**.

3.19.2 Change in A/E Professional's Duties, Etc. Construction Phase duties, responsibilities, and limitations of authority of the **A/E Professional** shall not be extended without written agreement of the **City** and the **A/E Professional**. Restrictions or modifications to the **A/E Professional's** duties and responsibilities cannot be imposed by the **City** without the consent of the **A/E Professional**.

3.19.3 Pre-construction Conferences. The **A/E Professional** shall attend all pre-construction conferences.

3.19.4 Site Visits. The **A/E Professional** shall visit the Site at intervals appropriate to the stage of construction, but no less than once a week, or as otherwise agreed by the **City** and the **A/E Professional**, to become familiar with the progress and quality of the Work and to determine with care if the Work is proceeding in accordance with the requirements of the Contract Documents. The **A/E Professional** shall cause its engineering and other consultants to make similar Site visits, at such times as may be required for observation of portions of the Work designed and/or specified by them. The **A/E Professional** shall not be required to make continuous on-site inspections to check the quality or quantity of the Work. The **A/E Professional** shall promptly submit to the **City** a detailed written report subsequent to each on site visit, which shall include any observation of material deviations by the Contractor or subcontractors from the requirements of the Contract Documents.

3.19.5 Job Meetings. The **A/E Professional** shall attend all job meetings. The number of meetings shall be as set forth in APPENDIX A for a particular Project. The **A/E Professional** shall also be required to be present when governmental authorities having jurisdiction over the Project visit the Site to inspect the Work. The **A/E Professional** will exercise good care and diligence in discovering and promptly reporting to the **City**, as well as to the Contractor, any defects or deficiencies in the Work.

3.19.6 Construction Means, Methods, Etc. The **A/E Professional** shall not have control over or charge of and shall not be responsible for construction means, methods, techniques, sequences, or procedures, or for safety precautions and programs in connection with the Work. However, the **A/E Professional** shall promptly report to the **City** any perceived irregularities.

3.19.7 Contractor's Schedule. Except as otherwise provided in this Agreement, the **A/E Professional** shall not be responsible for the Contractor's schedules or failure to carry out the Work in accordance with the Contract Documents, except to the extent that such failure

is caused by the **A/E Professional**. Except as otherwise provided in this Agreement, the **A/E Professional** shall not have control over or charge of acts or omissions of the Contractor, its Subcontractors, or their agents or employees, or of any other persons performing portions of the Work. However, nothing in this paragraph shall relieve the **A/E Professional** of its obligations to the **City** elsewhere in this Agreement. The **A/E Professional** shall review all schedules presented by the Contractor and advise the **City** as to the appropriateness of same.

3.19.8 Communications. The **City** and the Contractor may communicate through the **A/E Professional**. Communications by and with the **A/E Professional's** consultants shall be through the **A/E Professional**, unless the **City** deems it necessary or expedient to speak directly to the consultants.

3.19.9 Applications and Certifications for Payment. Based on the **A/E Professional's** observations of the Work and evaluations of the Contractor's applications for payment, the **A/E Professional** shall review and certify the appropriate amounts due the Contractor within five (5) business days after receipt of the Contractor's application for payment, and such certifications shall be in the form requested by the **City**. The **A/E Professional's** certification for payment shall constitute a representation to the **City** based on the **A/E Professional's** observations at the site and on the data comprising the Contractor's application for payment that the Work has progressed to the point indicated and the quality of Work is in accordance with the Contract Documents. The foregoing representations are subject to minor deviations from the Contract Documents correctable prior to completion and to specific qualifications expressed by the **A/E Professional**. The **City** shall review and validate the certified payrolls for compliance with federal and state prevailing wage requirements. The **A/E Professional** is required to reconcile the applications for payment with the certified payrolls. The issuance of a certificate for payment shall further constitute a representation that the Contractor is entitled to payment in the amount certified. Timely payment of Contractor is required by M.G.L. c. 30, §39K; therefore, the **A/E Professional** shall establish office procedures assuring either immediate mail or messenger delivery of the approved applications for payment to the **City**. .

3.19.10 Rejection of Work. The **A/E Professional** shall have the responsibility, obligation, and authority to reject Work which (1) does not conform to the Contract Documents; or (2) the **A/E Professional** believes to be defective; or (3) the **A/E Professional** believes will not produce a completed Project that conforms to the Contract Documents or that will prejudice the integrity of the design concept of the completed Project as a functioning whole as indicated by the Contract Documents. The **A/E Professional** shall promptly notify the **City** of such rejection. Whenever the **A/E Professional** considers it necessary or advisable for implementation of the intent of the Contract Documents, the **A/E Professional** will have the responsibility, obligation, and authority to require additional inspection or testing of the Work in accordance with the provisions of the Contract Documents, whether or not such Work is fabricated, installed, or completed; provided, however, the **A/E Professional** must obtain the **City's** prior written approval of any such special inspection or testing. However, neither this authority of the **A/E Professional** nor a decision made in good faith either to exercise or not to exercise such authority shall give rise to a duty or responsibility of the **A/E Professional** to the Contractor, Subcontractors, Suppliers, other persons performing portions of the Work.

3.19.11 Submittals. The **A/E Professional** shall review and approve or take other appropriate action upon the Contractor's submittals such as Proposed Change Orders, Shop Drawings,

Product Data, and Samples, for the purpose of: (a) determining compliance with applicable laws, statutes, ordinances, codes, orders, rules, and regulations; and (b) determining whether the Work, when completed, will be in compliance with the requirements of the Contract Documents. The **A/E Professional's** action shall be taken with such reasonable promptness as to cause no delay in the Work taking into account the time periods set forth in the latest schedule prepared by the Contractor and approved by the **A/E Professional** and, in any event, such action shall be taken within fourteen (14) days after submittal to the **A/E Professional**. The **A/E Professional** shall indemnify the **City** for any monies paid by the **City** to the Contractor as a result of the **A/E Professional's** delay in taking appropriate action, as described above, where such delay is not caused in any part by the **City**. Review of such submittals is not conducted for the purpose of determining the accuracy and completeness of other details such as dimensions and quantities or for substantiating instructions for installation or performance of equipment or systems designated by the Contractor, all of which remain the responsibility of the Contractor to the extent required by the Contract Documents. The **A/E Professional's** review shall not constitute approval of safety precautions or, unless otherwise specifically stated by the **A/E Professional**, of construction means, methods, techniques, sequences, or procedures. The **A/E Professional's** approval of a specific item shall not indicate approval of an assembly of which the item is a component. When professional certification of performance characteristics of materials, systems, or equipment is required by the Contract Documents, the **A/E Professional** shall be entitled to rely upon such certification to establish that the materials, systems, or equipment will meet the performance criteria required by the Contract Documents.

3.19.12 Change Orders and Work Change Directives. The **A/E Professional** shall prepare Change Orders and Work Change Directives, with supporting documentation and data if deemed necessary by the **A/E Professional** for the approval and execution in accordance with the Contract Documents, and may authorize minor changes in the Work not involving an adjustment in the Contract Sum or an extension of the Contract Time (which is the time in which the Work reaches final completion) and which are not inconsistent with the intent of the Contract Documents.

3.19.13 Interpretations, Clarifications, and Decisions of the A/E Professional.

3.19.13.1 The **A/E Professional** will interpret, clarify, and decide matters concerning performance under and requirements of the Contract Documents on written request of either the **City** or the Contractor. The **A/E Professional's** response to such requests will be made with reasonable promptness and within the time set forth herein. Any such written interpretations, clarifications, or decisions shall be binding on the **City** and the Contractor. Interpretations, clarifications, and decisions of the **A/E Professional** shall be consistent with the intent of and reasonably inferable from the Contract Documents and shall be in writing or in the form of drawings. The **A/E Professional** may, as the **A/E Professional** judges desirable, issue additional drawings or instructions indicating in greater detail the construction or design of the various parts of the Work; such drawings or instructions may be effected by a Field Order or other notice to the Contractor, provided such drawings or instructions are reasonably consistent with the previously existing Contract Documents. The **A/E Professional** shall not be liable for results of interpretations, clarifications, and decisions so rendered in good faith and in the absence of negligence by the **A/E Professional**.

3.19.13.2 Time Limit for Rendering Decisions. The **A/E Professional** shall render written

interpretations, clarifications, and decisions within a reasonable time, but in no event more than seven (7) days after receipt of same.

3.19.14 Aesthetic Effect. The **A/E Professional's** decisions on matters relating to aesthetic effect must be consistent with the **City's**. The **A/E Professional** shall advise the **City** in matters relating to aesthetic effect; however, the **City's** decision in these matters shall be final.

3.19.15 Claims.

3.19.15.1 Initial Referral. All Claims, the bases of which arise prior to final payment or the earlier termination of the Contract, shall be referred initially to the **A/E Professional** for action as provided herein.

3.19.15.2 Time Period and Action. The **A/E Professional** shall review Claims and shall do one of the following within seven (7) days of receipt of the Claim:

3.19.15.2.1 Defer any action with respect to all or any part of a Claim for the purpose of requesting and receiving additional information from either party;

3.19.15.2.2 Decline to render a decision for any reason which it deems appropriate (including, but not limited to, the fact that the Claim involves allegations of fault on the part of the **A/E Professional**); or

3.19.15.2.3 Render a decision on all or a part of the Claim.

3.19.15.2.4 If the **A/E Professional** requests additional information, the **A/E Professional** shall take action with respect to the Claim no later than seven (7) days after receipt of the additional information. The **A/E Professional** shall notify the parties in writing of its disposition of such Claim. If the **A/E Professional** decides that the Work relating to such Claim should proceed regardless of its disposition of such Claim, the **A/E Professional** shall issue to the Contractor a written order to proceed.

3.19.15.3 Decisions.

3.19.15.3.1 Decisions by the City or the A/E Professional. (Reference: M.G.L. c. 30, §39P). In every case in which this Contract requires the **City**, any official, or its **A/E Professional** to make a decision on interpretation of the Specifications, approval of equipment, material or any other approval, or progress of the Work, the decision shall be made promptly and, in any event, no later than seven (7) days after the written submission for decision; but if such decision requires extended investigation and study, the **City**, the official, or the **A/E Professional** shall, within seven (7) days after the receipt of the submission, give the party making the submission written notice of the reasons why the decision cannot be made within the seven day period and the date by which the decision will be made.

3.19.15.4 Resolved Claims. If a Claim is resolved, the **A/E Professional** shall obtain or prepare the appropriate documentation and provide the **City** and the Contractor with a copy of same.

3.19.16 Determination of Substantial and Final Completion. On behalf of the **City**, the **A/E Professional** shall conduct inspections, determine the dates of Substantial Completion and final completion, and shall issue a certificate of Substantial Completion, with the prior written consent of the **City**. Such inspections shall include a reasonable number of Site visits by the **A/E Professional** and the **A/E Professional's** engineering consultants. The **A/E Professional** shall provide to the **City** a written report of all findings with recommendations for appropriate action. The **A/E Professional** will receive and review (and approve or disapprove, as the case may be) written guarantees, operating manuals, spare parts lists, value charts, and related documents required by the Contract Documents to be assembled by the Contractor. When the **A/E Professional** is satisfied that all such documents are complete as required by the Contract Documents, the **A/E Professional** shall issue a final certificate of payment.

3.19.17 Inspection Prior to End of Guarantee Period. Notwithstanding any other provision in this Agreement, at least thirty (30) days prior to the expiration of the Contractor's guarantee period, the **A/E Professional** shall assist the **City** in inspecting the Project at the **City's** request and provide to the **City** a written report of all findings with recommendations for appropriate action. Such inspections shall include a reasonable number of Site visits by the **A/E Professional** and the **A/E Professional's** engineering consultants.

3.19.18 Certificate of Occupancy. The **A/E Professional** shall be responsible for satisfying any and all requirements with respect to services of an **A/E Professional** necessary to obtain a permanent certificate of occupancy under the Commonwealth of Massachusetts State Building Code.

3.19.19 Limitation on the A/E Professional's Responsibilities.

3.19.19.1 Neither the **A/E Professional's** authority to act under the provisions of the Contract Documents nor any decision made by the **A/E Professional** in good faith to exercise or not to exercise such authority shall give rise to any duty or responsibility of the **A/E Professional** to the Contractor, any Subcontractor, any Supplier, any surety for any of them, or any other person. The **A/E Professional** will not have control over or charge of and will not be responsible for construction means, methods, techniques, sequences, or procedures, or for safety precautions and programs in connection with the Work, since these are solely the Contractor's responsibility as provided in Article 5 of the General Terms and Conditions. The **A/E Professional** will not be responsible for the Contractor's failure to carry out the Work in accordance with the Contract Documents. The **A/E Professional** will not have control over or charge of and will not be responsible for acts or omissions of the Contractor, Subcontractors, Suppliers, or of any other persons performing portions of the Work.

ARTICLE 4

A/E PROFESSIONAL'S ADDITIONAL SERVICES

4.1. IN GENERAL. The services described hereunder shall be paid for by the **City** in addition to the compensation for Basic Services. Prior to performing any service which the **A/E Professional** claims to be an Additional Service, the **A/E Professional** shall notify the **City** in writing that the service is an Additional Service, and shall provide with such notice an estimate of the additional compensation which will be payable to the **A/E Professional** for performing such service. Such service shall not be performed, nor shall such estimate be exceeded, without the **City's** prior written approval. Failure to so notify the **City** and obtain the **City's** written approval shall constitute a waiver of the **A/E Professional's** claim for additional compensation on account of such services. These services shall be provided only if authorized or confirmed in writing by the **City**. Notwithstanding anything to the contrary in this Agreement, the **City** shall not be responsible to pay and the **A/E Professional** shall not be entitled to receive compensation for any additional service if such service was required due to the fault of the **A/E Professional** or the **A/E Professional's** failure to perform in accordance with the terms of this Agreement. Neither the **A/E Professional** nor its consultants shall be compensated for any services involved in preparing changes that are required for additional Work that should have been anticipated by the **A/E Professional** in the preparation of the Construction Documents, as reasonably determined by the **City**.

4.2. LIST OF ADDITIONAL SERVICES. The following list of Additional Services is intended to be illustrative and not considered all-inclusive.

4.2.1. Making major revisions in Plans, Specifications, or other documents when such major revisions are:

4.2.1.1. inconsistent with approvals or instructions previously given by the **City**, including revisions made necessary by adjustments in the **City's** program or project budget;

4.2.1.2. required by the enactment or revision of codes, laws, or regulations subsequent to the preparation of such documents; or

4.2.1.3. due to changes required as a result of the **City's** failure to render decisions in a timely manner and where such failure is in no way caused by the **A/E Professional**.

4.2.2. Providing services required because of major changes in the Project instigated by the **City**.

4.2.3. Undertaking material design work requested by the **City** in connection with Change Orders, Construction Change Directives, and the Contractor's value engineering proposals, provided that evaluation and judgments of the proposed changes and value engineering substitutions shall be provided as a Basic Service.

4.2.4. Providing consultation concerning replacement of Work damaged by fire or other cause during construction, and furnishing services required in connection with the replacement of such Work; provided, however, that such services are not required as a result of the negligence of the **A/E Professional**.

4.2.5. Providing any other services not otherwise included in this Agreement.

ARTICLE 5

OTHER CONDITIONS OR SERVICES

5.1. OTHER SERVICES. Any other services which are part of Basic Services are set forth in APPENDIX A.

5.2. HAZARDOUS MATERIALS. Unless otherwise provided in this Agreement, the **A/E Professional** and the **A/E Professional's** consultants shall have no responsibility for the discovery, presence, handling, removal, or disposal of, or exposure of persons to hazardous materials in any form at the Project Site, including, but not limited to, asbestos, asbestos products, polychlorinated biphenyl, or other toxic substances, provided, however, the **A/E Professional** shall report to the **City** the presence and location of any hazardous material observed by the **A/E Professional** (or any material suspected to exist) or that an A/E professional of similar skill and expertise should have observed.

ARTICLE 6

THE CITY'S RESPONSIBILITIES

6.1. REQUIREMENTS FOR THE PROJECT. The **City** shall consult with the **A/E Professional** regarding requirements for the Project, including the **City's** contemplated objectives, schedule, constraints, and criteria, including space requirements and relationships, flexibility, expandability, special equipment, systems, and site requirements.

6.2. BUDGET. The **City** shall consult with the **A/E Professional** in order to establish and update an overall budget for the Project, including the Construction Cost, the **City's** other costs and reasonable contingencies related to all of these costs.

6.3. AUTHORIZED REPRESENTATIVE The **City** shall designate a representative authorized to act on the **City's** behalf with respect to the Project. The **City** or such authorized representative shall render decisions in a timely manner pertaining to documents submitted by the **A/E Professional** in order to avoid unreasonable delay in the orderly and sequential progress of the **A/E Professional's** services.

6.4. CONSULTANTS. The **City** shall furnish the services of consultants not listed in APPENDIX A for a particular Project.

6.5. FURNISHING INFORMATION OR SERVICES. Notwithstanding anything to the contrary written herein, the **City** shall only furnish information or services to the extent that any such information or service is reasonably required by the **A/E Professional** to perform its services under this Agreement. The **A/E Professional** shall review and confirm the sufficiency of any test and information furnished to the **A/E Professional** by or on behalf of the **City** pursuant to this section.

6.6. NOTICE OF FAULT OR DEFECT. The **City** shall give prompt written notice to the **A/E Professional**, if the **City** becomes aware of any fault or defect in the Project or nonconformance with the Contract Documents.

ARTICLE 7

USE OF THE A/E PROFESSIONAL'S PLANS, SPECIFICATIONS, AND OTHER DOCUMENTS

7.1. IN GENERAL. The Plans, Specifications, and other documents prepared by the **A/E Professional** for this Project are instruments of the **A/E Professional's** service for use solely with respect to this Project and, unless otherwise provided, the **A/E Professional** shall be deemed the author of these documents and shall retain all common law, statutory, and other reserved rights, including the copyright (Note: if this contract is federally funded, see Appendix L Federal Requirements regarding royalties and copyrights). The **City** shall be permitted to retain copies, including reproducible copies, of the **A/E Professional's** Plans, Specifications, and other documents for information and reference in connection with the **City's** use and occupancy of the Project. The **A/E Professional's** Plans, Specifications, or other documents shall not be used by the **City** or others on other projects, except by agreement in writing. However, it is expressly understood and agreed that the **City** shall have the right to utilize the Plans, Specifications, and other documents in the event the **City** expands the Project, corrects any deficiencies, or makes any renovations or repairs to the Project. In the event of termination or purported termination of this Agreement by either party, the **City** may use the Plans, Specifications, and other documents in connection with the Project, notwithstanding any dispute between the **City** and the **A/E Professional** as to the reason for validity of the termination, provided only that the **A/E Professional** has been paid for its work through the date of the termination, unless the matter of such payment is subject to litigation or other dispute resolution procedure provided for herein.

7.2. OFFICIAL REGULATORY REQUIREMENTS. Submission or distribution of the Plans, Specifications, and other documents to meet official regulatory requirements or for similar purposes in connection with the Project is not to be construed as publication in derogation of the **A/E Professional's** reserved rights herein.

ARTICLE 8

BASIS OF COMPENSATION

8.1. IN GENERAL. For Basic Services, compensation shall be as provided in the APPENDIX A for a particular Project.

8.2. STIPULATED SUM. Where the compensation is based on a stipulated sum, progress payments for Basic Services in each phase shall be as stated in APPENDIX A for a particular Project.

8.3. MATERIAL CHANGE IN SCOPE OR SERVICES. In the event of a material change in the scope or services of the Project or the **A/E Professional's** services, the **A/E Professional** shall continue to perform in accordance with the terms of this Agreement during the course of any renegotiation of the **A/E Professional's** compensation hereunder. Equitable adjustments shall be made to the total dollar amount of this Agreement in the event of changes in scope or services herein. (*Reference: M.G.L. c. 7, §38G for designer contracts subject to the Designer Selection Statute, but this section applies also to contracts not subject to M.G.L. c. 7, §38G*).

8.4. ADDITIONAL SERVICES OF THE A/E PROFESSIONAL. For Additional Services of the **A/E Professional**, compensation shall be as stated in APPENDIX A for a particular Project.

8.5. ADDITIONAL SERVICES OF THE CONSULTANTS. For additional services of consultants, compensation shall be the actual cost billed to the **A/E Professional** for such services stated

in APPENDIX A for a particular Project.

8.6. REIMBURSABLE EXPENSES. For Reimbursable Expenses, compensation shall be the actual cost billed to the **A/E Professional**, not including any tax. The City will provide its tax-exempt number upon request.

ARTICLE 9

PAYMENT TO THE A/E PROFESSIONAL

9.1. PAYMENT TO A/E PROFESSIONAL. The City shall make payments directly to the **A/E Professional** within forty-five (45) days after the City receives and approves the **A/E Professional's** detailed certified monthly statement. The detailed monthly statement must include, at minimum, itemized hours and description of work performed by the **A/E Professional** (including, but not limited to, all employees of the **A/E Professional** and its agents), and an itemized list of Reimbursable Expenses. Records of the **A/E Professional's** expenses and hours pertaining to this Project shall be kept in accordance with generally accepted accounting principles, which principles shall be consistently applied. Said records shall be available to the City or its authorized representative upon reasonable notice for inspection and copying during regular business hours for six (6) years after the date of the final certificate of payment.

9.2. NO ADVANCE PAYMENTS. No payments will be made in advance of services rendered.

9.3. DEDUCTIONS. Deductions may be made from the **A/E Professional's** compensation, if the **A/E Professional** has not properly performed the services required in accordance with the terms of this Agreement.

ARTICLE 10

INSURANCE REQUIREMENTS

10.1. LIABILITY INSURANCE. The **A/E Professional** at its own expense must obtain and maintain a professional liability insurance policy covering negligent errors, omissions, and acts of the **A/E Professional** or of any person for whose performance the **A/E Professional** is legally liable arising out of the performance of such contracts for A/E services. The City may require a consultant employed by the **A/E Professional** subject to this subparagraph to obtain and maintain a similar liability insurance policy. Certificates of insurance are attached hereto as APPENDIX C. The **A/E Professional** shall furnish new certificates for each Project naming such Project and shall update such certificates when they expire. A Certificate of insurance shall be included herein as Appendix C.

10.2. INSURANCE RATING. Any insurance carrier utilized to fulfill the insurance requirements of this Contract shall have a minimum A.M. Best rating of A-X.

10.3. MINIMUM COVERAGES. The **A/E Professional** and its structural, mechanical, and electrical engineering consultants shall each maintain the following minimum insurance coverages:

10.3.1. Workers' Compensation insurance- co-called "statutory coverage" in compliance with Massachusetts law;

10.3.2. Valuable Papers insurance in the amount of \$100,000 covering damage to plans, drawings, computations, field notes, or other similar data relating to the Work covered by this

Agreement;

10.3.5. Commercial general liability insurance with a primary limit of not less than \$500,000 combined single limit.

10.3.6. Professional Liability insurance in an amount not less than \$1,000,000, including contractual liability coverage with all coverage retroactive to the earlier date of this Agreement or the commencement of the **A/E Professional's** services in relation to the Project.

10.4. INSURANCE TERMS. The City shall be named as a certificate holder on all of the above required insurance. All insurance shall be provided by companies qualified and licensed to do business in the Commonwealth of Massachusetts and acceptable to the City, and Professional Liability Insurance shall be maintained for a period of six (6) years following the last performance of services under this Agreement. Certificates evidencing such insurance shall be furnished to the **City** upon the execution of this Agreement by the **A/E Professional** and upon each renewal period thereafter. The policies shall provide that the policies shall not be cancelled, renewed, or amended without thirty (30) days' prior notice to the **City**. All requests by the **A/E Professional** for approval of engineers or other consultants shall be accompanied by certificates setting forth the types and amounts of insurance carried by them. The **A/E Professional** shall require each such engineer or other consultant approved by the **City** to maintain the insurance shown in such certificate in accordance with the provisions of this paragraph.

ARTICLE 11

STATUTORY RECORD-KEEPING AND RECORD-FILING REQUIREMENTS (M.G.L. C. 30, §39R)

___(If this contract is federally funded, see also Federal Requirements attached hereto as Appendix B.)

11.1. The **A/E Professional** shall make and keep for at least six years after final payment, books, records, and accounts which in reasonable detail accurately and fairly reflect the transactions and dispositions of the **A/E Professional**.

11.2. Until the expiration of six (6) years after final payment, the office of inspector general, and the deputy commissioner of capital planning and operations shall have the right to examine any books, documents, papers or records of the **A/E Professional** or of its subcontractors that directly pertain to and involve transactions relating to, the **A/E Professional** or its subcontractors.

If this contract is subject to the Massachusetts Designer Selection Statute, M.G.L., c. 7, §38A-1/2 et seq., and if the Contract Amount exceeds \$100,000, the provisions of M.G.L. c. 30, §39R contained in sections 11.3 –11.7 below shall be applicable.

11.3. The **A/E Professional** shall describe any change in the method of maintaining records or recording transactions which materially affect any statements filed with the **City**, including in its description the date of the change and reasons therefore, and shall accompany said description with a letter from the **A/E Professional's** independent certified public accountant approving or otherwise commenting on the changes.

11.4. The **A/E Professional** has filed a statement of management ("management," as used in these paragraphs is defined in M.G.L. c. 30, §39R(a)(7) as "the chief executive officers, partners, principals or other person or persons primarily responsible for the financial and operational policies and practices of the contractor" which is the **A/E Professional** herein) on internal accounting controls as set forth in

M.G.L. c. 30, §39R(c) prior to the execution of this Agreement.

11.5. The **A/E Professional** must file with the **City** a statement of management as to whether the system of internal accounting controls of the **A/E Professional** and its subsidiaries reasonably assures that:

11.5.1. transactions are executed in accordance with management's general and specific authorization;

11.5.2. transactions are recorded as necessary: to permit preparation of financial statements in conformity with generally accepted accounting principles, and to maintain accountability for assets;

11.5.3. access to assets is permitted only in accordance with management's general or specific authorization; and

11.5.4. the record accountability for assets is compared with the existing assets at reasonable intervals and appropriate action was taken with respect to any difference.

11.6. The **A/E Professional** has filed with DCAM prior to the execution of this Agreement and will continue to file annually, an audited financial statement for the most recent completed fiscal year as set forth in M.G.L. c. 30, §39R(d). The final statement filed shall include the date of final payment. All statements shall be accompanied by an accountant's report. Such statements shall be made available to the **City** upon request.

11.7. The **A/E Professional** shall file with the **City** a statement prepared and signed by an independent certified public accountant, stating that s/he has examined the statement of management on internal accounting controls, and expressing an opinion as to:

11.7.1. whether the representations of management in response to this paragraph and the previous paragraph are consistent with the result of management's evaluation of the system of internal accounting controls; and

11.7.2. whether such representations of management are, in addition, reasonable with respect to transactions and assets in amounts which would be material when measured in relation to the **A/E Professional's** financial statements.

NOTE: RECORDS AND STATEMENTS REQUIRED TO BE MADE, KEPT OR FILED UNDER THE PROVISIONS OF M.G.L. c. 30, §39R ARE NOT PUBLIC RECORDS AS DEFINED IN M.G.L. c.4, §7 AND SHALL NOT BE OPEN TO PUBLIC INSPECTION, EXCEPT AS PROVIDED HEREIN.

(Reference: M.G.L. c. 30, §39R)

ARTICLE 12

TERMINATION, SUSPENSION, OR ABANDONMENT

12.1. Except for reasons of nonpayment, this Agreement may be terminated by either party upon not less than seven (7) days' written notice should the other party fail to perform in accordance with the terms of this Agreement through no fault of the party initiating the termination and may be terminated without

_____ House Doctor Contract

Year One _____

cause by the **City** upon at least seven (7) days' written notice to the **A/E Professional**. In the event this Agreement is terminated by the **City** pursuant to this paragraph, the **A/E Professional** shall be entitled to receive compensation for Basic and Additional Services properly performed and for all substantiated Reimbursable Expenses incurred to the date of the notice of termination, but in no event shall compensation exceed the amount specified hereafter if the Project does not proceed and in no event shall any payment be due earlier than such payment would otherwise be due hereunder. Moreover, the **City** shall be entitled to retain from the monies alleged to be due to the **A/E Professional** an amount that reasonably reflects the cost and expense incurred or to be incurred by the **City** associated with the termination, if the termination is with cause.

12.2. The **City** reserves the right to stop or suspend the work upon seven (7) days' written notice to the **A/E Professional**, with no resulting fee adjustment to the **A/E Professional**, unless such suspension extends for more than twelve (12) months, in which case the **A/E Professional's** compensation shall be equitably adjusted when the project is resumed to provide for expenses incurred in the interruption and resumption of the **A/E Professional's** services. The **A/E Professional** shall have no cause for termination of this Agreement based on suspension of the Project unless such suspension extends for more than twelve (12) months.

12.3. Persistent failure by the **City** to make payments to the **A/E Professional** in accordance with this Agreement or persistent failure of the **City** to pay the **A/E Professional** within forty-five (45) days of receipt of a statement for services properly performed shall be considered nonperformance and cause for termination. "Persistent" herein shall mean at least three occasions.

12.4. If the **City** fails to make payment when due for services and expenses properly performed, the **A/E Professional** may, upon thirty (30) days' written notice to the **City**, suspend performance of services under this Agreement. Unless the **A/E Professional** receives within thirty (30) days of the date of the notice payment in full for such services that have been properly performed, the suspension shall take effect without further notice. In the event of a suspension of services, the **A/E Professional** shall have no liability to the **City** for delay or damage caused by the **City** because of such suspension of services.

ARTICLE 13

MISCELLANEOUS PROVISIONS

13.1. GOVERNING LAW. This Agreement shall be governed by the laws of the Commonwealth of Massachusetts and, if federally funded, applicable provisions of the Federal Requirements attached hereto as Appendix L.

13.2. VENUE. Venue for any court action or proceeding shall be Middlesex County in the Commonwealth of Massachusetts only. The **Contractor**, all Subcontractors, and Suppliers waive any and all jurisdictional and venue defenses.

13.3. PARTNERS, SUCCESSORS, ASSIGNS, ETC. The **City** and the **A/E Professional**, respectively, bind themselves, their partners, successors, assigns, and legal representatives to the other party to this Agreement and to the partners, successors, assigns, and legal representative of such other party with respect to all covenants of this Agreement.

13.4. PROHIBITION AGAINST ASSIGNMENT. The **A/E Professional** shall not assign, in whole or in part, its rights and obligations under the Contract Documents without prior written consent of the **City**. An assignment without the prior written consent of the **City** shall not relieve the **A/E Professional** of its obligations thereunder.

13.5. ENTIRE AGREEMENT. This Agreement represents the entire and integrated agreement between the **City** and the **A/E Professional** and supersedes all prior negotiations, representations, or agreements, either written or oral. This Agreement can be amended only by a written instrument signed by both the **City** and the **A/E Professional**.

13.6. THIRD-PARTY BENEFICIARIES. Nothing contained in this Agreement shall create a contractual relationship with or a cause of action in favor of a third party against either the **City** or the **A/E Professional**.

13.7. NOTICES AND DEMANDS. Notices and demands required by or permitted to be given hereunder shall be hand-delivered or given by registered mail, certified mail, express mail with a tracking receipt, or FedEx and shall be addressed to the parties at the addresses set forth in APPENDIX I. Such notices and demands may be sent by facsimile transmission if such transmission is followed by hand delivery, or registered, certified, or express mail, or FedEx on the same day or the following business day. Notice and demands shall be deemed to have been given when delivered, or when mailed, or when transmitted by facsimile, if followed by hand delivery or registered or certified mail as provided herein.

13.8. WAIVER OF RIGHTS. The **City's** review, approval, acceptance, or payment for services under this Agreement shall not operate as a waiver of any rights under this Agreement and the **A/E Professional** shall be and shall remain liable to the **City** for all damages incurred by the **City** as the result of the **A/E Professional's** failure to perform in conformance with the terms and conditions of this Agreement. The rights and remedies of the **City** provided for under this Agreement are in addition to any other rights or remedies provided or allowed by law.

13.9. PERSONAL LIABILITY. No member, officer, director, trustee, representative, consultant, volunteer participant, or employee of the **City** shall be personally liable to the **A/E Professional** under any term or provision of this Agreement for the **City's** payment obligation or otherwise, or because of any breach hereof.

13.10. INDEMNIFICATION. The **A/E Professional** shall indemnify and save harmless the **City** from and against all claims, costs, and liability arising out of the **A/E Professional's** Services hereunder, to the extent that such claims, costs, and liability are the result of the negligent acts, errors, or omissions of the **A/E Professional**, or breaches by the **A/E Professional** of its obligations hereunder or claimed to be the result thereof.

13.11. A/E PROFESSIONAL'S PRINCIPALS AND SENIOR PERSONNEL AND CONSULTANTS. The **City** is relying on the continued participation in the Project of the principals and senior personnel whose names and registration numbers appear in APPENDIX J for a particular Project. The **A/E Professional** shall not remove any such individual from a particular Project or reduce his or her time commitment to such Project without the **City's** written consent unless such individual dies, becomes disabled, or terminates his or her employment. The replacement of any individual listed in APPENDIX J shall be subject to the **City's** written approval. The names and registration numbers of Consultants, if any, shall be included as part of APPENDIX J for a particular Project.

13.12. USE OF PROJECT-RELATED DOCUMENTS. The **A/E Professional** may, upon prior written consent of the **City**, include representations of the design of the Project, including photographs of the exterior and interior, among the **A/E Professional's** promotional and professional materials. The **A/E Professional's** materials shall not include the **City's** confidential or proprietary information if the **City** has previously advised the **A/E Professional** in writing of the specific information considered by the **City**

to be confidential or proprietary. The **City** shall provide professional credit for the **A/E Professional** on the construction sign and in the promotional materials for the Project. The **City** considers all information concerning the Project to be confidential and proprietary unless otherwise expressly indicated in writing to the **A/E Professional**.

ARTICLE 14

CERTIFICATIONS

14.1. The undersigned **A/E Professional** certifies under the penalties of perjury that:

14.1.1. the **A/E Professional** has not given, offered or agreed to give any gift, contribution or offer of employment as an inducement for, or in connection with, the award of a contract for design services;

14.1.2. no consultant to, or subcontractor for the **A/E Professional** has given, offered or agreed to give any gift, contribution, or offer of employment to the **A/E Professional**, or to any other person, corporation, or entity as an inducement for or in connection with the award to the consultant or subcontractor of a contract by the **A/E Professional**;

14.1.3. no person, corporation, or other entity, other than a bona fide, full-time employee of the **A/E Professional** has been retained or hired to solicit for or in any way assist the **A/E Professional** in obtaining the contract for design services upon an agreement or understanding that such person, corporation, or other entity be paid a fee or other consideration contingent upon the award of the contract to the designer;

14.1.4. if and as required by M.G.L. c. 30, §39R, the **A/E Professional** has internal accounting controls the **A/E Professional** shall:

14.1.4.1. file regular statements of management concerning internal auditing controls; and

14.1.4.2. file an annual audited financial statement; and submit a statement from an independent certified public accountant that s/he has examined management's internal auditing controls and expresses an opinion as to their consistency with management's statements and whether such statements are reasonable with respect to transactions and assets that are substantial in relation to the **A/E Professional's** financial statements, as provided by M.G.L. c. 7, §38H(e) and

14.1.4.3. the **A/E Professional** has filed a statement of management on internal accounting controls as set forth in M.G.L. c. 30, §39R(c) prior to the execution of this Agreement;

14.1.4.4the **A/E Professional** has filed with DCAM prior to the execution of this Agreement an audited financial statement for the most recent completed fiscal year as set forth in M.G.L. c. 30, §39R(d); and

14.1.5. the **A/E Professional** has complied with all the laws of the Commonwealth pertaining to taxes, reporting of employees and contractors, and withholding and remitting child support (M.G.L. c. 62C, §49A).

14.1.6. the **A/E Professional** will, for a six-year period after the final payment, maintain accurate books, records, and accounts which in reasonable detail accurately and fairly reflect the transactions and dispositions of the **A/E Professional**;

APPENDICES: The following are hereby incorporated as part of this Agreement:

APPENDIX A:	Project-by-Project Scope of Service
APPENDIX A-1	Draft Amendment for Specific Projects
APPENDIX B:	Federal Requirements --Applicable to Federally Funded Projects
APPENDIX C:	Insurance Certificates (See Article 10)
APPENDIX D:	Notices
APPENDIX E:	Truth-In-Negotiations Certificate
APPENDIX F:	Living Wage Form
APPENDIX G:	Certificate of Good Standing
APPENDIX H:	RFP and Procurement Documentation
APPENDIX I:	Hourly Rates
APPENDIX J:	Massachusetts Registration Numbers
APPENDIX K:	Certificate of Non-Collusion, Tax Compliance Certification
APPENDIX L:	Certificate of Signature Authority, Signature Form

SIGNATURE PAGE FOLLOWS:

IN WITNESS WHEREOF, the **City** and the **A/E Professional** have executed this Agreement as a sealed instrument on the day and year first written above.

CITY OF SOMERVILLE

I hereby certify that the total contract amount is \$_____, and that an unencumbered balance of \$_____ is available for the first fiscal year of this contract. I further certify that a sum of \$_____ is hereby encumbered against the appropriate account for the purposes of this contract. Further, I certify that as funds become available, I will encumber additional sums as are required under this contract.

Edward Bean
City Auditor

Joseph A. Curtatone
Mayor

Angela M. Allen
Purchasing Director

Stan Koty
Commissioner, Public Works

APPROVED AS TO FORM:

Francis X. Wright, Jr.
City Solicitor

A/E Professional
Maguire Group, Inc.

X_____
Signature of Authorized Agent of Vendor

Thomas H. Cousineau
Printed Name of Authorized Agent Vendor

Vice President
Title of Authorized Agent of Vendor

33 Commercial Street, Suite 1
Street Address of Vendor

Foxborough, MA 02035
City, State and Zip

Tax ID #

FOR CORPORATIONS ONLY:

I certify that the individual signing on behalf of the corporation has the authority to bind the corporation.

Clerk's Signature

Sherrill Papalia
Print or Type Clerk's Name

_____ House Doctor Contract

Year One _____

APPENDIX A
Project-by-Project Scope of Services

The Scope of Services for particular Projects shall be included in this section. Each individual Project shall be separately numbered as Appendix A-1, Appendix A-2, and so forth. The Scope of Services for an individual Project shall include the following information:

Basic Services: specify whether any of the following are included as Basic Services

- Schematic Design
- Design Development
- Construction Documents
- Bidding and Award of the Construction Contract
- Administration of the Construction Contract
- Other (Feasibility Studies, Master Plans, Programming, etc.)

Additional Services, if any (typically provided at an hourly rate – see Compensation below)

Compensation:

- If hourly, include hourly rates for all key personnel and consultants
- If fixed fee, specify whether paid
 - in one lump sum upon completion of services
 - in monthly progress payments
 - at the end of each task or phase (allocate dollar amount to each task or phase)

Commencement Date of Services:

- Schematic Design – specify
- Design Development – specify
- Construction Documents – specify
- Bidding and Award of the Construction Contract – already specified in §3.5
- Administration of the Construction Contract – already specified in §3.6
- Other – specify

Personnel

Names, titles, registration numbers (if applicable), and hourly rates (if not specified elsewhere) of the A/E Professional's principal(s) and key personnel (link names to titles and hourly rates)

Firm names, individual names, titles, registration numbers (if applicable), and hourly rates or other specified compensation of the A/E Professional's consultants

Names of consultants provided by the City

APPENDIX A-1
Draft Amendment for Specific Project

MAYOR'S
CONTRACT COVER SHEET

Contract # _____

Vendor # _____

P.O. Number: _____

Amount \$ _____

Contracting City Dept.:

Dept. Head Authorizing PO:

Contract Amount:

Contract Term:

Amendment Purpose:

Vendor Name: Maguire Group Inc.

Vendor Address: 33 Commercial Street, Suite 1
 Foxborough, MA 02035

Phone: 508-543-1700

Contact: Thomas H. Cousineau, AIA

Commenter:

Additional Comments:

Commenter:

Additional Comments:

Commenter:

Additional Comments:

_____ House Doctor Contract

Year One _____

**CITY OF SOMERVILLE
AMENDMENT CHECKLIST/ROUTING SLIP**

FY:

DEPARTMENT

Project Manager:

Fund Acct. No.:

Contractor Contact Person:

Budget Line Item:

Contractor:

Contract No.:

Project Location:

Cover Sheet []

Prepare Amendment Package []

Alterations to:

-contracted period []

-contract amount []

-scope of work []

Proof Typed Amendment []

Insurance Current []

Project Manager Review []

City Attorney Review (Substance) []

Purchasing Director Review (Substance) []

Vendor Review & Signature []

Department Head Review, Signature and Requisition []

Purchasing Department Review []
(Requisition & P.O.)

Auditor Review and Signature []

City Attorney Review (Form) []

City Solicitor Signature []

Mayor's Review and Signature []

NOTE: Under UPA the option of extensions and/or renewals must have been included in the original bid solicitation.

_____ House Doctor Contract

Year One _____

_____ House Doctor Contract

Year One _____

CITY OF SOMERVILLE**LEGAL REVIEW OF CONTRACTS**

City Attorney:

Contractor/Vendor:

Project:

Contract Number:

I. Attorney Review for Substance**Follow-up needed:****A. Contracts**

1. Consistency of dates
2. Legal name of vendor/contractor verified - yes
3. Name of authorized signatory verified
4. Title of authorized signatory verified
5. Address of vendor/contractor
6. Name of clerk for corporations
7. Federal Tax I.D. Number
8. Scope of Work (Appendix A)
9. General Terms and Conditions
10. Insurance certificate matches insurance requirements (Appendix C)
11. Living Wage Notice (Appendix F)
12. Certificate of Good Standing for corporations (Appendix G)
13. Procurement Documentation (Appendix H) – Sound Business Practices
14. Statement of Management if contract is over \$100,000 (N/A)
15. 100% Performance Bond for public works over \$10,000 (N/A)
16. 100% Performance Bond public building over \$25,000 (N/A)
17. 100% Payment Bond for public works over \$10,000 (N/A)
18. 100% Payment Bond for public buildings over \$25,000 (N/A)
19. 50% Payment Bond public works or buildings over \$2,000 (N/A)
20. Section 3 for contracts over \$100,000 and award over \$200,000 (N/A)
21. Wages: Davis Bacon _____ State _____ Both _____ (N/A)

B. Amendments

1. Is amendment within scope of contract?
2. WHEREAS clause explains need for amendment.
3. Less than 25% increase for Chapter 30B contracts. (N/A)
4. Unit price remains the same.
5. Current insurance certificate attached.

ATTORNEY SIGN OFF AS TO SUBSTANCE ()

II. Review as to form for contracts and amendments

1. All blanks filled in.
2. All signatures present

This contract, reviewed by the above-referenced attorney, is in full conformity with all legal requirements of the City of Somerville as to form.

ATTORNEY SIGN OFF AS TO FORM ()

_____ House Doctor Contract

Year One _____

PURCHASING CONTRACT#:

AMENDMENT #:

PURCHASE ORDER #:

AMOUNT:

**ISSUING DEPARTMENT:
DIVISION:**

CONTRACT PERIOD:

CITY OF SOMERVILLE

DEPARTMENT

CONTRACT

with

for

ACCORDING TO SPECIFICATIONS CONTAINED HEREIN

_____ House Doctor Contract

Year One _____

AMENDMENT #_____ to CONTRACT #_____
BETWEEN THE CITY OF SOMERVILLE, ACTING BY AND THROUGH THE
DEPARTMENT

This Amendment is made this _____ day of _____, _____, by and between the City of Somerville, acting by and through the **DEPARTMENT**, (the "City"), with offices at _____, **ADDRESS**, Somerville, Massachusetts **ZIP** and the following Vendor ("Vendor"):

Maguire Group Inc.
33 Commercial Street, Suite 1
Foxborough, MA 02035
508-543-1700

Whereas,

Whereas, [state reasons for the amendment]

Whereas,

Now, Therefore, in consideration of the mutual covenants contained herein, the City and the Vendor mutually covenant and agree that the Contract shall be amended as follows:

1. **Scope** (state amendments to scope, if any):
2. **Time** (state new date of expiration, if any):
3. **Price** (state change in price, if any):
4. **Other:**
5. **Insurance** - Concurrent with the execution of this Amendment, the Vendor shall deposit with the City new policies or certificates of insurance, in form and substance satisfactory to the City, for any (i) additional insurance coverage required by this Amendment or (ii) existing insurance coverage about to expire.
6. **Continuing Representations** - Execution of this Amendment by the Vendor shall constitute an affirmation that the certifications, representations and warranties contained in the Agreement remain true and correct.
7. **No Default** - Execution of this Amendment by the Vendor shall constitute an affirmation that the Vendor is not in default of any certification, representation, warranty, covenant or other provision contained in the Agreement and no event has occurred which, but for the lapse of time or service of notice, or both, would constitute a default thereunder.
8. **Authority.** (not applicable to sole proprietorships. This Amendment has been duly

_____ House Doctor Contract

Year One _____

executed and delivered on behalf of Vendor by its Partner pursuant to and in full compliance with the authority granted in its organizational documents and its votes or resolutions, which authority has not been amended, modified or rescinded as of the date hereof. The person executing this Agreement is, as of the date hereof, the Partner of Vendor.

- 9. Ratification:** In all other respects the Agreement is ratified and confirmed.

SIGNATURE PAGE FOLLOWS

IN WITNESS WHEREOF, the **City** and the **A/E Professional** have executed this Agreement as a sealed instrument on the day and year first written above.

CITY OF SOMERVILLE

I hereby certify that the total contract amount is \$_____, and that an unencumbered balance of \$_____ is available for the first fiscal year of this contract. I further certify that a sum of \$_____ is hereby encumbered against the appropriate account for the purposes of this contract. Further, I certify that as funds become available, I will encumber additional sums as are required under this contract.

Edward Bean
City Auditor

Joseph A. Curtatone
Mayor

Angela M. Allen
Purchasing Director

Stan Koty
Commissioner, Public Works

APPROVED AS TO FORM:

Francis X. Wright, Jr.
City Solicitor

A/E Professional

Maguire Group, Inc.

X_____
Signature of Authorized Agent of Vendor

Thomas H. Cousineau
Printed Name of Authorized Agent Vendor

Vice President
Title of Authorized Agent of Vendor

33 Commercial Street, Suite 1
Street Address of Vendor

Foxborough, MA 02035
City, State and Zip

Tax ID #

FOR CORPORATIONS ONLY:

I certify that the individual signing on behalf of the corporation has the authority to bind the corporation.

Clerk's Signature

Sherrill Papalia
Print or Type Clerk's Name

APPENDIX B
Federal Requirements – Applicable to Federally Funded Projects

OVERALL COMPLIANCE

1. Vendor shall comply with all provisions of the Strategic Development and Community Development Act of 1974 and regulations issued pursuant thereto, the Community Development Block Grant (CDBG) Entitlement Program Regulations, 24 CFR 570 et seq. and instructions issued by the Funding Source, and with all federal, state and local laws applicable to this Project.
2. Vendor shall comply with U.S. Office of Management and Budget (OMB) Circular A-102. Vendor hereby consents to jurisdiction of the federal court.
3. Vendor shall permit the City, HUD, the Comptroller General of the United States, or any of their duly authorized representatives, to have access to any books, documents, papers, and records of the Vendor relating to this Project.

AFFRIMATIVE ACTION FOR HANDICAPPED WORKERS

4. The Vendor will not discriminate against any employee or applicant for employment because of physical or mental handicap in regard to any position for which the employee or applicant is qualified. The Vendor agrees to take affirmative action to employ, advance in employment and otherwise treat qualified handicapped individuals without discrimination based upon their physical or mental handicap in all employment practices.
5. The Vendor agrees to comply with all rules, regulations orders issued pursuant to the Rehabilitation Act of 1973. In the event of the Vendor's noncompliance with the requirements of this clause, actions for noncompliance may be taken in accordance with the rules, regulations and orders issued pursuant to the Rehabilitation Act. The Vendor will notify all those with which it has contractual understandings that the subgrantee is bound by the terms of the Rehabilitation Act of 1973, and is committed to take affirmative action to employ and advance in employment physically and mentally handicapped individuals.

ENVIRONMENTAL PROTECTION

6. National Environmental Policy Act: In order to assure that the policies of the National Environmental Policy Act of 1969 are most effectively implemented in connection with the expenditure of funds under this contract, the Vendor shall cooperate and assist the City in complying with the HUD Environmental Review Procedures (24 CFR Part 58).
7. Clean Air Act: If this contract is in excess of \$100,000.00, Vendor shall comply with the Clean Air Act of 1970.

HISTORIC PRESERVATION

8. Vendor shall comply with all federal laws and regulations governing historic preservation, the Historic Districts Act of the Commonwealth of Massachusetts (M.G.L. Chapter 40C) and the City of

Somerville Historic District Ordinance.

WORK HOURS AND SAFETY STANDARDS

9. In construction contracts in excess of \$2,000 and other contracts in excess of \$2,500, the Vendor shall comply with Sections 103 and 107 of the Contract Work Hours Safety Standards Act (40 U.S.C. 327-330).

CONFLICT OF INTEREST

10. Vendor shall comply with all federal and state conflict of interest statutes and regulations.

NONDISCRIMINATION UNDER TITLE VI OF THE CIVIL RIGHTS ACT OF 1964

11. Vendor shall comply with the requirements of Title VI of the Civil Rights Act of 1964 (P.L. 88-352) and HUD regulations thereto. In the sale, lease or other transfer of land acquired, clear or improved with assistance provided under this contract, the Vendor shall cause or require a covenant running with the land to be inserted in the deed or lease for such transfer, prohibiting discrimination upon the basis of race, color, religion, sex, or national origin, in the sale, lease, or rental, or in the use of occupancy of such land or any improvements erected or to be erected thereon, and providing that the Vendor, the CITY of SOMERVILLE and the United States are beneficiaries of and entitled to enforce such covenant. The Vendor, in undertaking its obligation in carrying out the Project assisted hereunder, agrees to take such measures as are necessary to enforce such covenant and will not itself so discriminate.

COPYRIGHT AND PATENTS

12. Copyright: The Vendor agrees that where any activity performed under this contract result in a book or other copyrightable material the Vendor is free to copyright the work, but the City and HUD reserve a royalty-free, non-exclusive and irrevocable license to reproduce, publish, or otherwise use, and to authorize others to use the work for government purposes.

13. Patents: The Vendor agrees that if activities performed under this contract produce any patentable items, patent rights, processes, or inventions, such fact shall be promptly and fully reported to the CITY of SOMERVILLE and HUD, and absent an agreement to the contrary, HUD shall determine whether protection of such invention or discovery shall be sought and how the rights in the invention or discovery, including the rights under any patent issued thereon, shall be allocated and administered in order to protect the public interest.

APPENDIX C
Insurance Certificates

APPENDIX D

Notices

In accordance with Article 13, §13.7 of the Contract between the City and the A/E Professional, where notice is required, it shall be given to the following parties:

- 1) in the case of the City, to

Stanley Koty
Commissioner of Public Works
City of Somerville DPW
One Franey Road
Somerville, MA 02144

with a copy to

Francis X. Wright, City Solicitor
Law Department, City Hall
93 Highland Avenue
Somerville, MA 02143; and

- 2) in the case of the A/E Professional, to

Thomas H. Cousineau, Vice President
Maguire Group Inc.
33 Commercial Street, Suite 1
Foxborough, MA 02035

or to such other persons at such other addresses as either party shall give written notice to the other from time to time.

APPENDIX E
Truth in Negotiations Certificate

FOR NEGOTIATED FEES

The undersigned hereby certifies under penalties of perjury that the wage rates and other costs used to support its compensation are accurate, complete and current at the time of contracting.

The undersigned agrees that the original contract price and any additions to the contract may be adjusted within one year of completion of the contract to exclude any significant amounts if the City determines that the fee was increased by such amounts due to inaccurate, incomplete or noncurrent wage rates or other costs.

BY: _____

Name and Title: _____

Project: _____

Date: _____

Reference: M.G.L. c. 7 § 38H (b)

APPENDIX F
Living Wage Form

SOMERVILLE LIVING WAGE ORDINANCE FORM

(Ordinance No. 1999-1*)

This form shall be included in all Invitations for Bids and Requests for Proposals which involve the furnishing of labor, time or effort (with no end product other than reports) by vendors contracting or subcontracting with the City of Somerville, where the contract price meets or exceeds the following dollar thresholds:

- a) \$50,000 for contracts commencing during the period 7-1-99 to 6-30-01
(Fiscal Years 2000 and 2001);
- b) \$30,000 for contracts commencing during the period 7-1-01 to 6-30-03
(Fiscal Years 2002 and 2003); and
- c) \$10,000 for contracts commencing during the period 7-1-03 and thereafter
(Fiscal Years 2004 and thereafter.);

The purpose of this form is to ensure that such vendors pay a “Living Wage” (defined below) to all covered employees (i.e., all employees except individuals in a city, state or federally funded youth program). In the case of bids, the City will award the contract to the lowest responsive and responsible bidder paying a Living Wage. In the case of RFP’s, the City will select the most advantageous proposal from a responsive and responsible offeror paying a Living Wage. In neither case, however, shall the City be under any obligation to select a bid or proposal that exceeds the funds available for the contract.

Definition of “Living Wage” For this contract or subcontract, as of 07-01-2010 “Living Wage” shall be deemed to be an hourly wage of no less than \$11.22/hour. From time to time, the Living Wage may be upwardly adjusted and amendments, if any, to the contract or subcontract may require the payment of a higher hourly rate if a higher rate is then in effect.

If the undersigned bidder or offeror is selected, this form will be attached to the contract or subcontract and the certifications made herein shall be incorporated as part of such contract or subcontract.

CERTIFICATIONS

- 1. The undersigned shall pay no less than the Living Wage to all covered employees who directly expend their time on the contract or subcontract with the City of Somerville.
- 2. The undersigned shall post a notice, (copy enclosed), to be furnished by the contracting City Department, informing covered employees of the protections and obligations

provided for in the Somerville Living Wage Ordinance, and that for assistance and information, including copies of the Ordinance, employees should contact the contracting City Department. Such notice shall

* Copies of the Ordinance are available upon request to the Office of the City Clerk

be posted in each location where services are performed by covered employees, in a conspicuous place where notices to employees are customarily posted.

- 3. The undersigned shall maintain payrolls for all covered employees and basic records relating hereto and shall preserve them for a period of three years. The records shall contain the name and address of each employee, the number of hours worked, the gross wages, a copy of the social security returns, and evidence of payment thereof and such other data as may be required by the contracting City Department from time to time.
- 4. The undersigned shall submit payroll records to the City upon request and, if the City receives information of possible noncompliance with the provisions the Somerville Living Wage Ordinance, the undersigned shall permit City representatives to observe work being performed at the work site, to interview employees, and to examine the books and records relating to the payrolls being investigated to determine payment of wages.
- 5. The undersigned shall not fund wage increases required by the Somerville Living Wage Ordinance by reducing the health insurance benefits of any of its employees.
- 6. The undersigned agrees that the penalties and relief set forth in the Somerville Living Wage Ordinance shall be in addition to the rights and remedies set forth in the contract an/or subcontract.

Executed this _____ day of _____.

Name of Vendor

By: _____
Name

Its: _____
Title

Signature

NOTICE TO ALL EMPLOYEES

Under the Somerville, Massachusetts' Living Wage Ordinance (Ordinance No. 1999-1), any person or entity who has entered into a contract with the City of Somerville is required to pay its employees who are involved in providing services to the City of Somerville no less than a "Living Wage". The Living Wage as of July 1, 2010 is \$11.22 per hour. The only employees who are not covered by the Living Wage Ordinance are individuals in a Youth Program. "Youth Program" as defined in the Ordinance, "means any city, state or federally funded program which employs youth, as defined by city, state or federal guidelines, during the summer, or as part of a school to work program, or in any other related seasonal or part-time program."

For assistance and information regarding the protections and obligations provided for in the Living Wage Ordinance and/or a copy of the Living Wage Ordinance, all employees should contact the City of Somerville's Purchasing Department directly.

APPENDIX G
Certificate of Good Standing

APPENDIX H
RFP and Procurement Documentation

APPENDIX I
Hourly Rates

APPENDIX J
Massachusetts Registration Numbers

George Delegas

Anthony Diluzio

Lynn Stapleton

APPENDIX K
Certificate of Non-Collusion
Tax Compliance Certification

APPENDIX L
Certificate of Signature Authority
Signature Form